A Public Health Profile



Macomb County Health Department Chart Book 2003

ACKNOWLEDGMENTS

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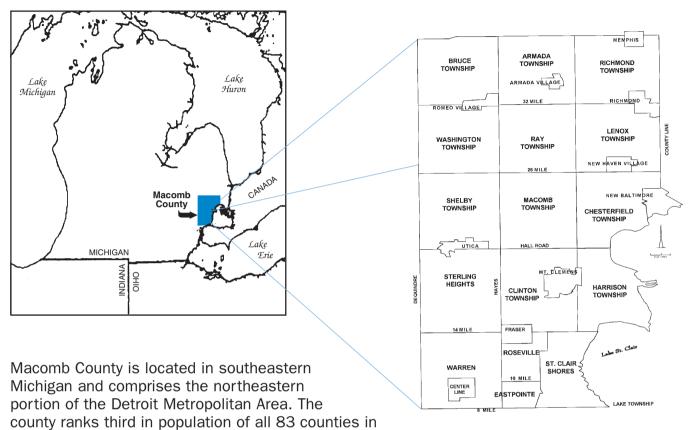
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Macomb County



the state and 47th out of 3,100 nationally. The estimated population at the end of 2003 was 822,051, representing an increase of 33, 902 persons between 2000 and 2003. During that period, Macomb County added more residents than any other county in the region. It is projected that the population residing in Macomb County will reach 930,420 by the year 2030.

Macomb County encompasses a landmass of 482 square miles includes a blend of urban, suburban, and rural settings. Macomb County is recognized as a leader in business and industry. Macomb County houses over 325,000 employees with Manufacturing employing 36% of the work force, followed by Service Industries at 28% and Retail Trades at 22% of the employment base. Macomb County enjoys the state's third highest county real estate value (state equalized value) at \$32 Billion, or 8.7% of the total state value. It has received the top rating from Moody's Investment Service in addition to being designated as a "Community of Economic Excellence" by the State of Michigan. In 2001, Macomb residents had a total personal income (TPI) of \$25.4 Billion, third highest in the state. The 1991-2001 average growth in TPI for Macomb residents was 5.0%.

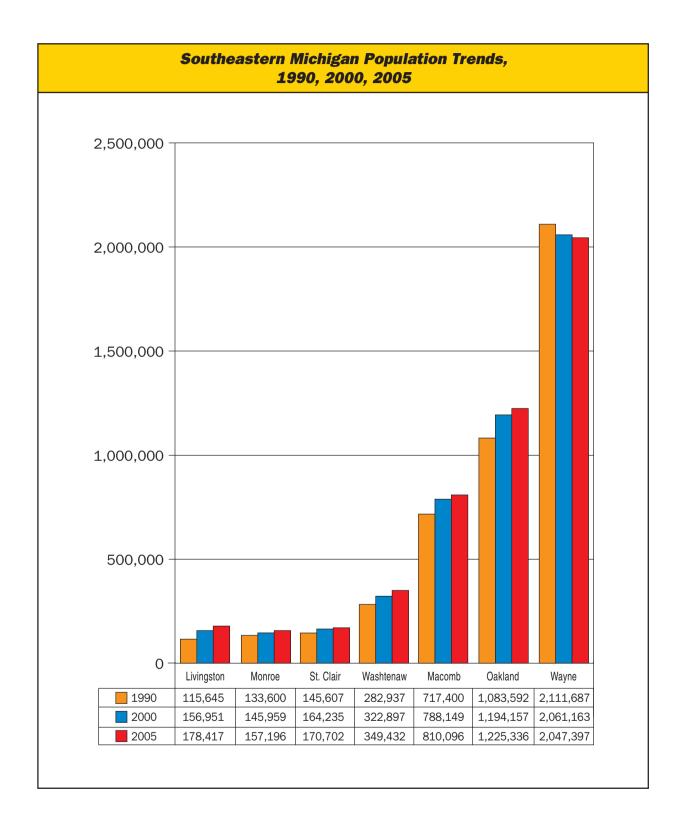
Over one half of the landmass in the county is farmland, parkland, woodland, wetland or grassland. There are over 130,000 students k-12 enrolled in 22 public school districts with an additional 14,500 students enrolled in private schools.

Macomb County is served by eight acute care hospitals (1,341 beds), 24 nursing care facilities (3,870 beds), and three psychiatric hospitals (177 beds).

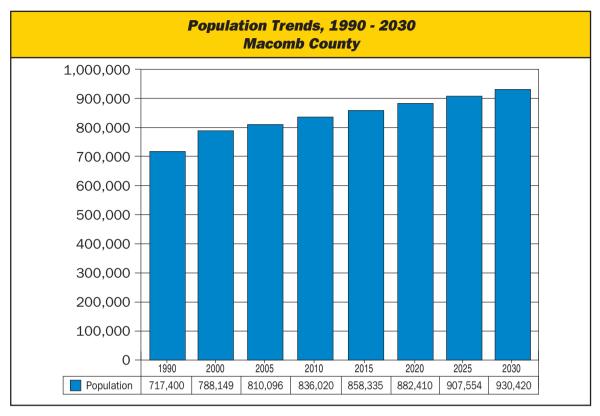
Demographics - Section B

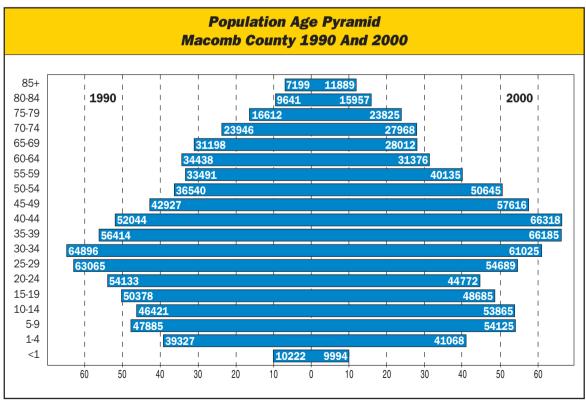
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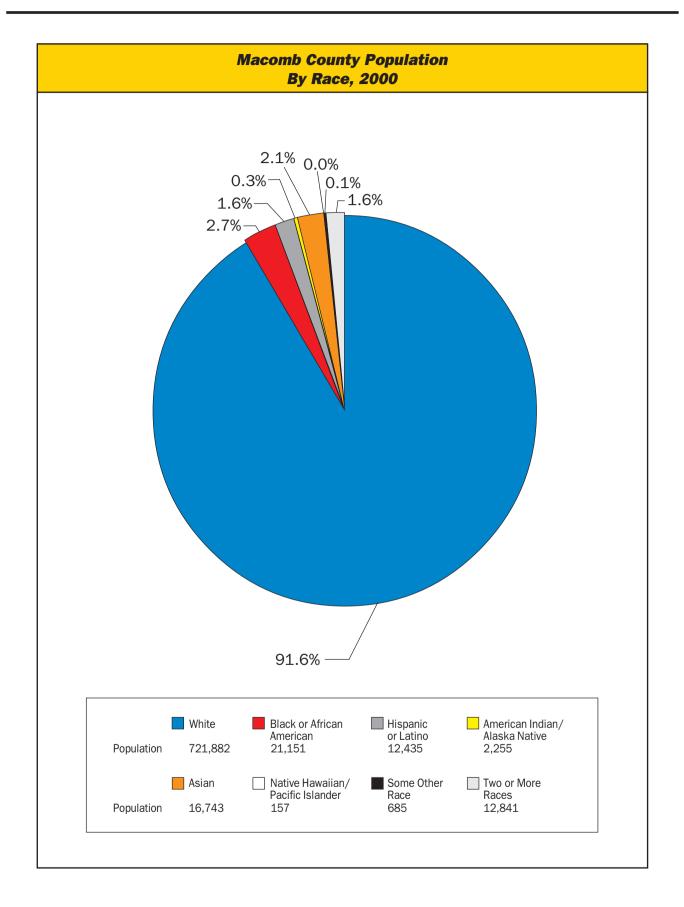
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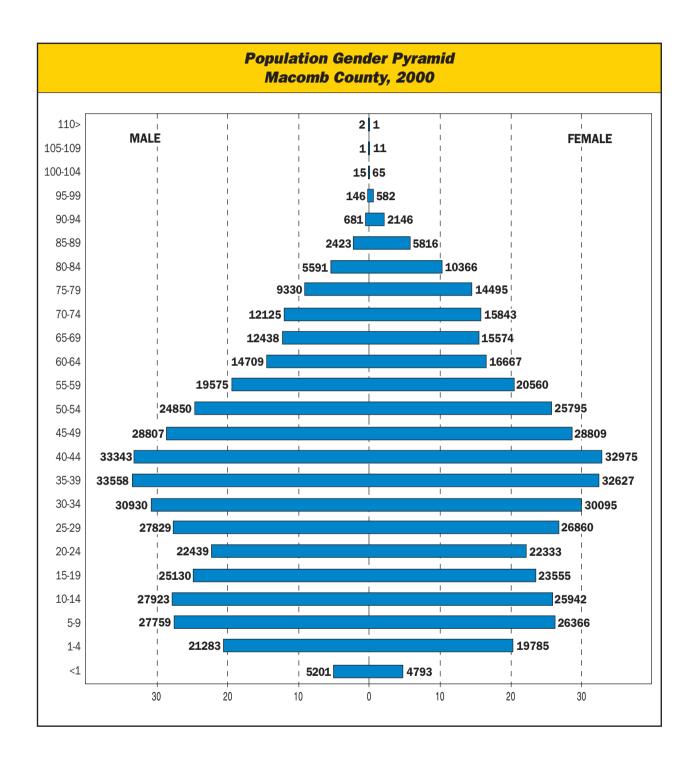


Notes: SEMCOG Regional Development Forecast, 2002
Population by Age prepared by the Division for Vital Records and Health Statistics, Michigan Department of Community Health using Population Estimated prepared by the Office of the State Demographer, Michigan Department of Management and Budget and Census 2000 from the U.S. Census Bureau.

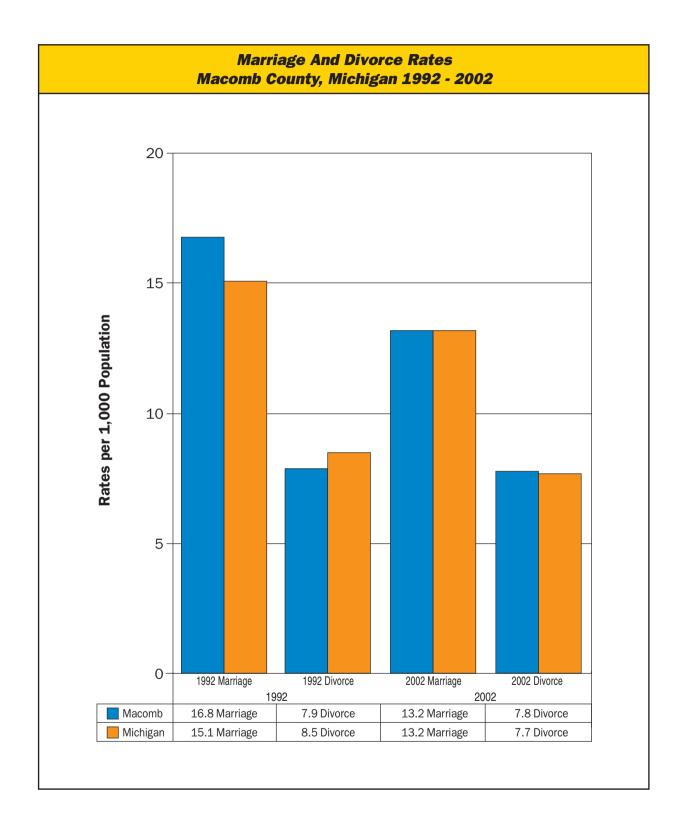
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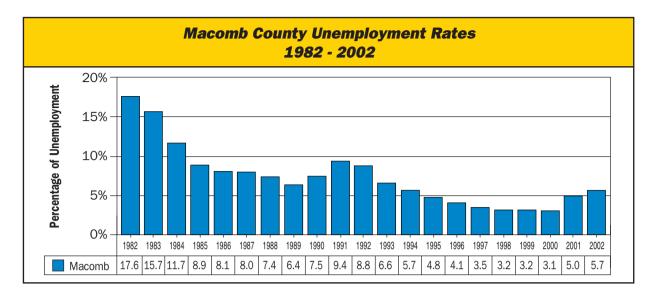


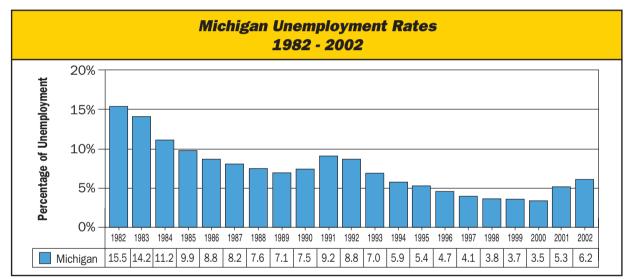
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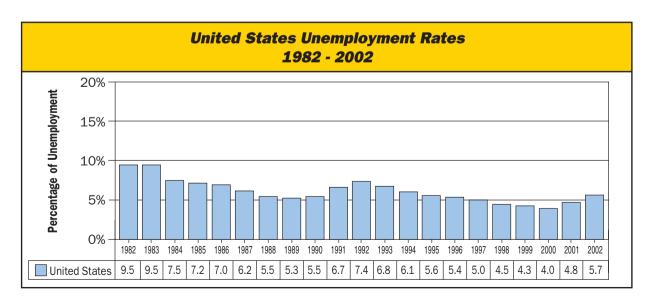


Note: Marriage and Divorce rates are persons per 1,000 population rather than events per population Division for Vital Records and Health Statistics, MDCH.

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Note: Michigan Jobs Commission / Employment Services Agency, U.S. Department of Labor, Bureau of Labor Statistics.

Health Care Delivery - Section C

Adults Who Have No Health Insurance, Macomb County Residents, 1999 and 2002	C 1
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Adults Who Have No Health Insurance Coverage, Macomb County Residents 1999 and 2002

			MACOMB COUNTY 1999		MACOMB COUNTY 2002		
CHARA	CTERISTICS	%	9!	5%C.I	%	9	5%C.I
Overall		5.8%	±	1.4%	11.2%	±	3.1%
Gender							
	Male	6.3%	±	2.4%	10.1%	±	3.1%
	Female	5.3%	±	1.8%	12.4%	±	5.1%
Race							
	White	5.7%	±	1.5%	9.5%	\pm	2.7%
	Other	10.0%	±	7.7%	29.3%	±	18.6%
Age							
	18-24	14.1%	±	7.3%	33.1%	\pm	15.2%
	25-34	11.8%	\pm	4.8%	21.5%	\pm	9.8%
	35-44	5.1%	\pm	2.9%	6.8%	\pm	4.4%
	45-54	3.1%	±	2.6%	7.8%	±	5.3%
	55-64	2.6%	±	2.7%	5.7%	±	5.8%
	65-74	0.0%	±	0.0%	0.6%	±	0.7%
	75+	0.0%	±	0.0%	2.8%	±	2.8%
Educati	ion						
	<h.s.< td=""><td>9.8%</td><td>±</td><td>5.9%</td><td>16.6%</td><td>\pm</td><td>10.5%</td></h.s.<>	9.8%	±	5.9%	16.6%	\pm	10.5%
	High School	6.5%	±	2.6%	13.1%	\pm	6.0%
	Some College	3.5%	±	2.1%	14.5%	\pm	6.0%
	College Grad.	3.1%	±	2.1%	3.2%	<u>±</u>	2.3%

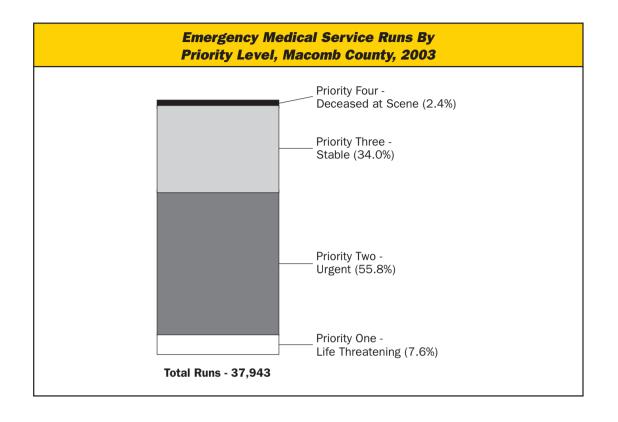
Percentage	Distribution	Of Insurance	e Coverage
By Source f	or Macomb C	ounty Resid	ents, 2002

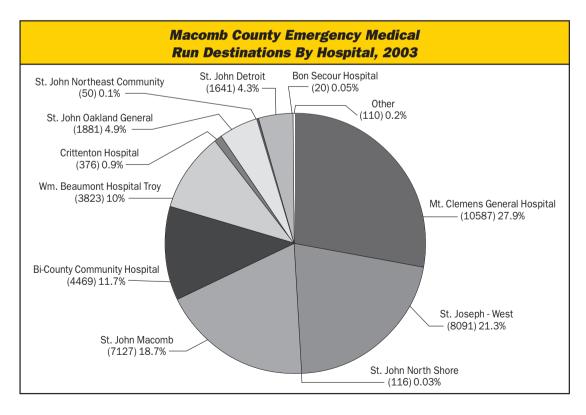
CHARACTERISTICS	EMPLOYER PROVIDED	GOVERNMENT SPONSORED	SELF PURCHASED	OTHER	NONE
Overall	64.80%	16.86%	4.72%	2.35%	11.27%
Gender					
Male	69.27%	12.39%	5.70%	2.63%	10.01%
Female	60.67%	21.00%	3.82%	2.09%	12.43%
Age					
18-24	60.27%	2.46%	3.65%	0.50%	33.11%
25-34	71.31%	3.61%	2.61%	0.91%	21.55%
35-44	81.20%	6.00%	4.21%	1.79%	6.81%
45-54	76.27%	11.11%	2.00%	2.81%	7.82%
55-64	74.46%	7.18%	6.88%	5.73%	5.75%
65-74	20.24%	66.20%	11.05%	1.95%	0.56%
75+	20.71%	65.47%	7.15%	3.79%	2.89%
Race					
White	65.88%	17.54%	4.59%	2.50%	9.49%
Other	54.43%	9.07%	6.25%	0.89%	29.36%
Education					
Less than HS	38.15%	34.87%	8.39%	1.97%	16.62%
HS Graduate	59.48%	18.62%	5.72%	3.11%	13.08%
Some College	64.80%	16.24%	3.77%	0.69%	14.5%
College Graduate	80.08%	9.96%	3.35%	3.42%	3.18%
Income					
Less than \$10,000	9.09%	36.03%	-	0.78%	54.09%
\$10,000-19,999	26.19%	44.09%	8.25%	6.44%	15.03%
\$20,000-34,999	48.59%	27.29%	4.77%	3.48%	15.87%
\$35,000-49,999	71.38%	9.51%	6.34%	2.21%	10.55%
\$50,000 or more	88.46%	3.40%	3.03%	1.23%	3.89%

Percentage Macomb County Adults That Had Medical, Dental Check-Up In The Last Year, 2002

CHARACTERISTICS	HAD MEDICAL CHECK-UP IN PAST YEAR	HAD DENTAL CHECK-UP IN PAST YEAR
Overall	75.91%	78.76%
Gender		
Male	68.40%	74.93%
Female	82.87%	82.31%
Age		
18-24	64.19%	82.78%
25-34	60.33%	71.21%
35-44	72.61%	82.98%
45-54	74.26%	84.38%
55-64	88.93%	79.20%
65-74	95.72%	77.00%
75+	94.30%	66.58%
Race		
White	75.28%	78.20%
Other	81.29%	84.91%
Education		
Less than HS	80.47%	69.96%
HS Graduate	74.40%	71.80%
Some College	76.32%	80.06%
College Graduate	76.11%	89.57%
Income		
Less than \$10,000	52.23%	60.06%
\$10,000-19,999	81.28%	55.44%
\$20,000-34,999	80.01%	72.55%
\$35,000-49,999	77.07%	82.96%
\$50,000 or more	72.17%	87.30%

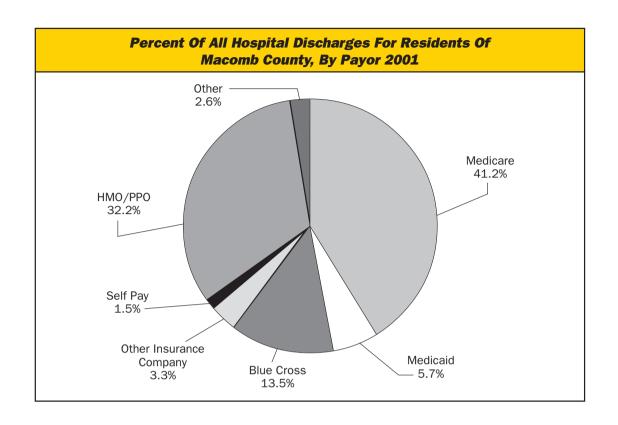
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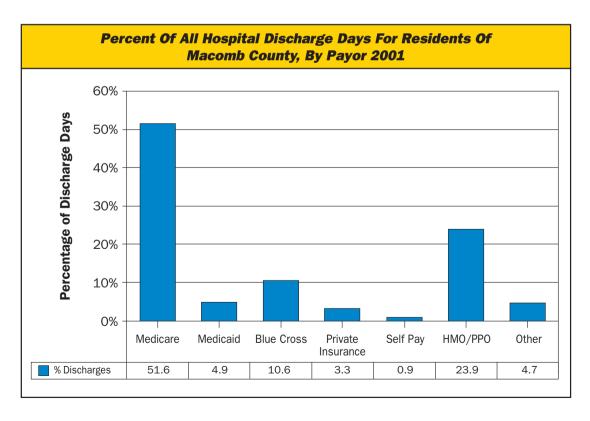




Notes: Macomb County EMS Statistics.

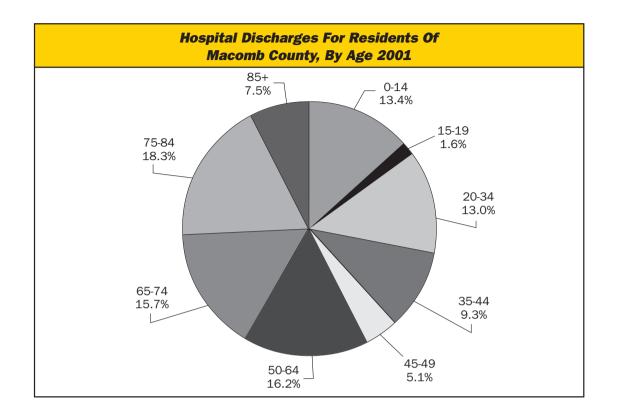
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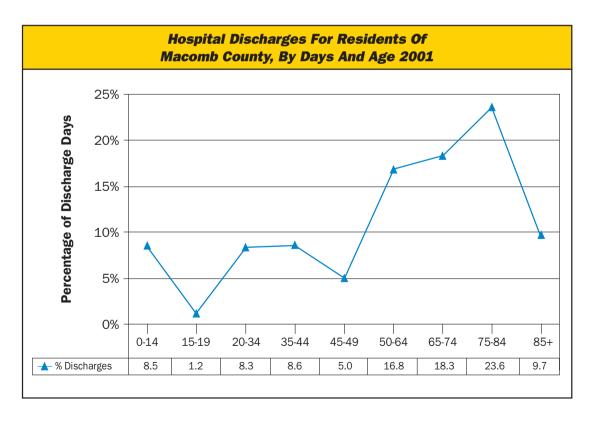




Note: Includes 7,131 discharges and 13,851 discharge days associated with normal newborns. **Source:** 2001 Michigan Inpatient Hospital Discharges, Michigan Department of Community Health.

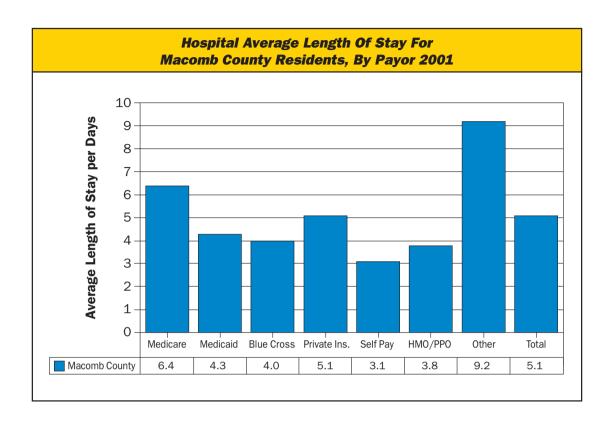
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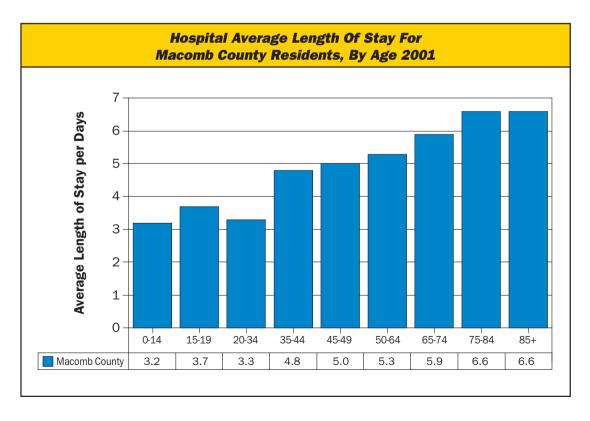




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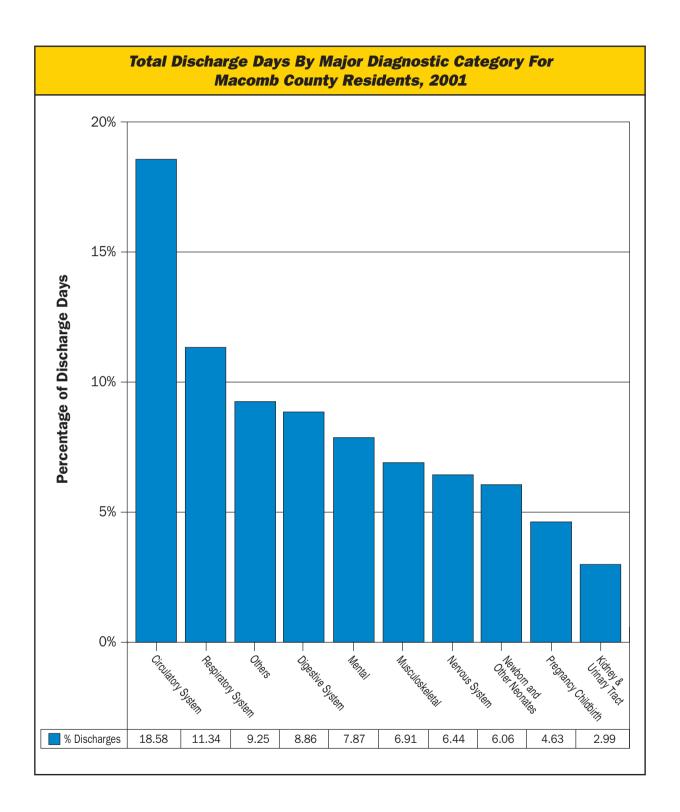
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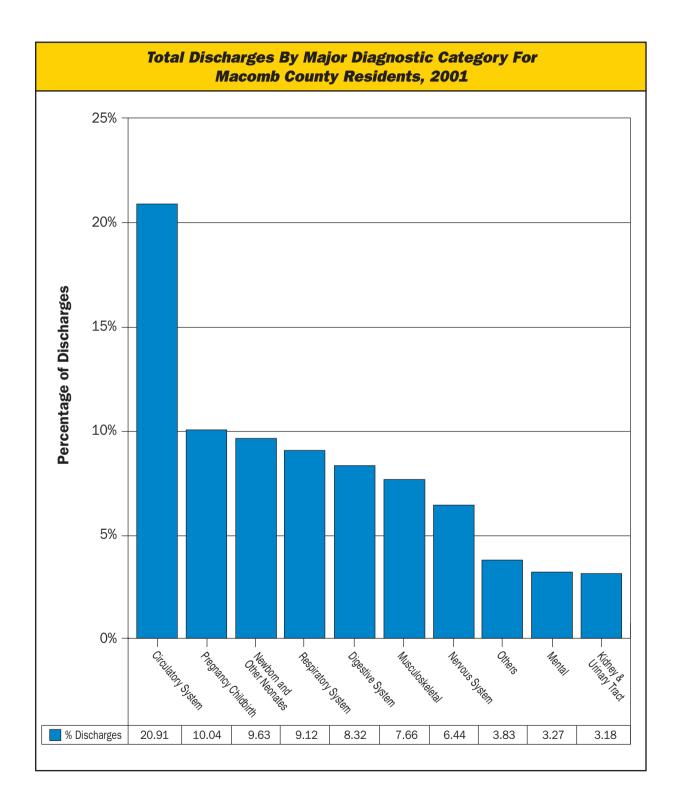




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Mortality and Morbidity - Section D

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Deaths From Five Leading Causes by Minor Civil Division of Residence, 2002 (table)	D 4
Leading Causes of Death, Macomb County Residents, 2002	D 5
Leading Causes of Death, Macomb County, Michigan, and United States, 2002	D 6
Deaths by Gender and Marital Status, Macomb County Residents, 2002	D 7
Years of Potential Life Lost Below Age 75, Due to Selected Causes of Death, Macomb County and Michigan, 2002	D 8
Years of Potential Life Lost Below Age 75, By Gender, Due to Selected Causes of Death, Macomb County and Michigan, 2002	D 9

Number Of Deaths By Minor Civil Division Of Residence Macomb County Residents, 1995 - 2002 **MINOR CIVIL DIVISION TOTAL** 6,404 6.566 6,622 6,843 7,168 7,180 7,179 7.448 ARMADA VILLAGE CENTER LINE CITY **EASTPOINTE** FRASER CITY GROSSE PTE SHORES-PT VILLAGE MEMPHIS-PT CITY MT CLEMENS CITY **NEW BALTIMORE-PT CITY** NEW HAVEN-PT VILLAGE RICHMOND CITY ROMEO VILLAGE ROSEVILLE CITY ST CLAIR SHORES CITY STERLING HEIGHTS CITY **UTICA CITY** 1,489 WARREN CITY 1,499 1,505 1,505 1,489 1,560 1,513 1.654 ARMADA TOWNSHIP **BRUCE TOWNSHIP** CHESTERFIELD TOWNSHIP **CLINTON TOWNSHIP** HARRISON TOWNSHIP LAKE TOWNSHIP LENOX TOWNSHIP MACOMB TOWNSHIP **RAY TOWNSHIP**

Notes: Minor civil division (MCD) data contained in vital statistics data files, and reports developed from the files, are based upon the information supplied to the department in the course of registering vital events. Special studies of MCD data quality revealed that there are inaccuracies in these data. The degree of inaccuracy encountered is as high as 25 percent. Any use of these data, especially for comparisons across MCDs, may be affected by inaccurate reporting. The most common mis-allocation error occurs with smaller cities or villages, surrounded by a township. People providing information for the vital record stipulate that the subject of the vital record or the decedent lives in a city, rather than in a township which was their actual residence. This is usually because the subjects post office address is the city. When rates are calculated from these data differ substantially from state or county rates, the analyst should determine if events were allocated to the proper MCD. Division for Vital Records and Health Statistics, Michigan Department of Community Health.

RICHMOND TOWNSHIP

WASHINGTON TOWNSHIP

SHELBY TOWNSHIP

UNKNOWN MCD

Deaths By Age And Minor Civil Division Of Residence Macomb County Residents, 2002

			2002					
MINOR CIVIL DIVISION	TOTAL	0-14	15-29	30-44	45-64	65-74	75 +	UNKNOWN
TOTAL	7,448	72	108	310	1,215	1,366	4,377	0
ARMADA VILLAGE	22	2	0	0	2	1	17	0
CENTER LINE CITY	146	0	2	1	21	29	93	0
EASTPOINTE	395	2	4	14	62	69	244	0
FRASER CITY	177	0	2	4	30	35	106	0
GROSSE PTE SHORES-PT VILLAGE	0	0	0	0	0	0	0	0
MEMPHIS-PT CITY	12	0	1	0	3	3	5	0
MT CLEMENS CITY	230	3	6	13	53	39	116	0
NEW BALTIMORE-PT CITY	92	4	1	7	20	11	49	0
NEW HAVEN-PT VILLAGE	26	1	0	3	8	8	6	0
RICHMOND CITY	64	0	1	1	7	7	48	0
ROMEO VILLAGE	49	1	2	1	7	8	30	0
ROSEVILLE CITY	525	8	10	36	88	101	282	0
ST CLAIR SHORES CITY	762	5	4	25	97	132	499	0
STERLING HEIGHTS CITY	989	17	17	33	165	170	587	0
UTICA CITY	59	0	5	4	9	10	31	0
WARREN CITY	1,654	11	15	70	246	353	959	0
ARMADA TOWNSHIP	21	0	0	2	3	4	12	0
BRUCE TOWNSHIP	25	0	0	3	5	6	11	0
CHESTERFIELD TOWNSHIP	215	4	6	12	49	35	109	0
CLINTON TOWNSHIP	861	6	6	33	136	150	530	0
HARRISON TOWNSHIP	202	2	3	10	36	34	117	0
LAKE TOWNSHIP	1	0	0	0	0	0	1	0
LENOX TOWNSHIP	29	0	0	0	4	3	22	0
MACOMB TOWNSHIP	271	3	8	18	60	52	130	0
RAY TOWNSHIP	30	0	2	2	2	8	16	0
RICHMOND TOWNSHIP	26	0	0	1	4	6	15	0
SHELBY TOWNSHIP	457	2	10	13	79	72	281	0
WASHINGTON TOWNSHIP	103	1	3	3	17	19	60	0
UNKNOWN MCD	5	0	0	1	2	1	1	0

Notes: Minor civil division (MCD) data contained in vital statistics data files, and reports developed from the files, are based upon the information supplied to the department in the course of registering vital events. Special studies of MCD data quality revealed that there are inaccuracies in these data. The degree of inaccuracy encountered is as high as 25 percent. Any use of these data, especially for comparisons across MCDs, may be affected by inaccurate reporting. The most common mis-allocation error occurs with smaller cities or villages, surrounded by a township. People providing information for the vital record stipulate that the subject of the vital record or the decedent lives in a city, rather than in a township which was their actual residence. This is usually because the subjects post office address is the city. When rates are calculated from these data differ substantially from state or county rates, the analyst should determine if events were allocated to the proper MCD. Division for Vital Records and Health Statistics, Michigan Department of Community Health.

Deaths By Race And Minor Civil Division Of Residence Macomb County Residents, 2002

MINOR CIVIL DIVISION	TOTAL	WHITE	BLACK	AMERICAN INDIAN	ASIAN/PI	OTHER	UNKNOWN
TOTAL	7,448	7,216	163	23	40	1	5
ARMADA VILLAGE	22	22	0	0	0	0	0
CENTER LINE CITY	146	142	3	0	1	0	0
EASTPOINTE	395	373	20	1	1	0	0
FRASER CITY	177	176	0	1	0	0	0
GROSSE PTE SHORES-PT VILLAGE	0	0	0	0	0	0	0
MEMPHIS-PT CITY	12	12	0	0	0	0	0
MT CLEMENS CITY	230	190	38	1	1	0	0
NEW BALTIMORE-PT CITY	92	89	3	0	0	0	0
NEW HAVEN-PT VILLAGE	26	16	10	0	0	0	0
RICHMOND CITY	64	63	0	1	0	0	0
ROMEO VILLAGE	49	47	2	0	0	0	0
ROSEVILLE CITY	525	504	16	2	2	0	1
ST CLAIR SHORES CITY	762	757	2	2	1	0	0
STERLING HEIGHTS CITY	989	965	13	2	8	0	1
UTICA CITY	59	58	0	0	1	0	0
WARREN CITY	1,654	1,611	21	7	13	1	1
ARMADA TOWNSHIP	21	21	0	0	0	0	0
BRUCE TOWNSHIP	25	25	0	0	0	0	0
CHESTERFIELD TOWNSHIP	215	209	3	2	0	0	1
CLINTON TOWNSHIP	861	829	24	2	6	0	0
HARRISON TOWNSHIP	202	199	3	0	0	0	0
LAKE TOWNSHIP	1	1	0	0	0	0	0
LENOX TOWNSHIP	29	27	2	0	0	0	0
MACOMB TOWNSHIP	271	268	2	0	0	0	1
RAY TOWNSHIP	30	29	0	0	1	0	0
RICHMOND TOWNSHIP	26	26	0	0	0	0	0
SHELBY TOWNSHIP	457	451	1	2	3	0	0
WASHINGTON TOWNSHIP	103	101	0	0	2	0	0
UNKNOWN MCD	5	5	0	0	0	0	0

Notes: Minor civil division (MCD) data contained in vital statistics data files, and reports developed from the files, are based upon the information supplied to the department in the course of registering vital events. Special studies of MCD data quality revealed that there are inaccuracies in these data. The degree of inaccuracy encountered is as high as 25 percent. Any use of these data, especially for comparisons across MCDs, may be affected by inaccurate reporting. The most common mis-allocation error occurs with smaller cities or villages, surrounded by a township. People providing information for the vital record stipulate that the subject of the vital record or the decedent lives in a city, rather than in a township which was their actual residence. This is usually because the subjects post office address is the city. When rates are calculated from these data differ substantially from state or county rates, the analyst should determine if events were allocated to the proper MCD. Division for Vital Records and Health Statistics, Michigan Department of Community Health.

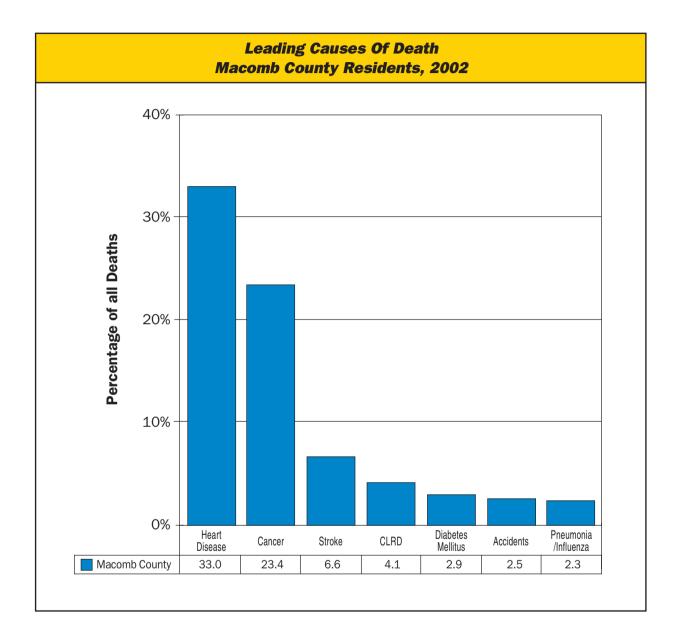
Deaths From 5 Leading Causes By Minor Civil Division Of Residence Macomb County Residents, 2002

MINOR CIVIL DIVISION	HEART	CANCER	STROKE	CLRD	DIABETES	
TOTAL	2,460	1,745	491	307	216	
ARMADA VILLAGE	9	4	1	1	0	
CENTER LINE CITY	51	26	14	5	4	
EASTPOINTE	125	97	21	22	12	
FRASER CITY	60	38	6	8	7	
MEMPHIS-PT CITY	6	2	0	1	1	
MT CLEMENS CITY	81	53	7	9	11	
NEW BALTIMORE-PT CITY	26	22	4	3	2	
NEW HAVEN-PT VILLAGE	6	7	1	4	1	
RICHMOND CITY	26	17	2	3	2	
ROMEO VILLAGE	14	10	4	3	0	
ROSEVILLE CITY	155	115	41	19	18	
ST CLAIR SHORES CITY	264	165	65	37	25	
STERLING HEIGHTS CITY	348	223	60	42	30	
UTICA CITY	21	16	1	1	2	
WARREN CITY	541	394	125	70	31	
ARMADA TOWNSHIP	10	6	0	0	1	
BRUCE TOWNSHIP	9	5	0	2	0	
CHESTERFIELD TOWNSHIP	66	61	14	7	10	
CLINTON TOWNSHIP	285	196	62	31	24	
HARRISON TOWNSHIP	60	58	10	5	8	
LAKE TOWNSHIP	0	0	0	0	0	
LENOX TOWNSHIP	8	8	0	3	1	
MACOMB TOWNSHIP	83	69	15	11	11	
RAY TOWNSHIP	11	8	3	1	1	
RICHMOND TOWNSHIP	10	6	0	1	4	
SHELBY TOWNSHIP	149	106	33	13	7	
WASHINGTON TOWNSHIP	34	32	2	5	3	
UNKNOWN MCD	2	1	0	0	0	

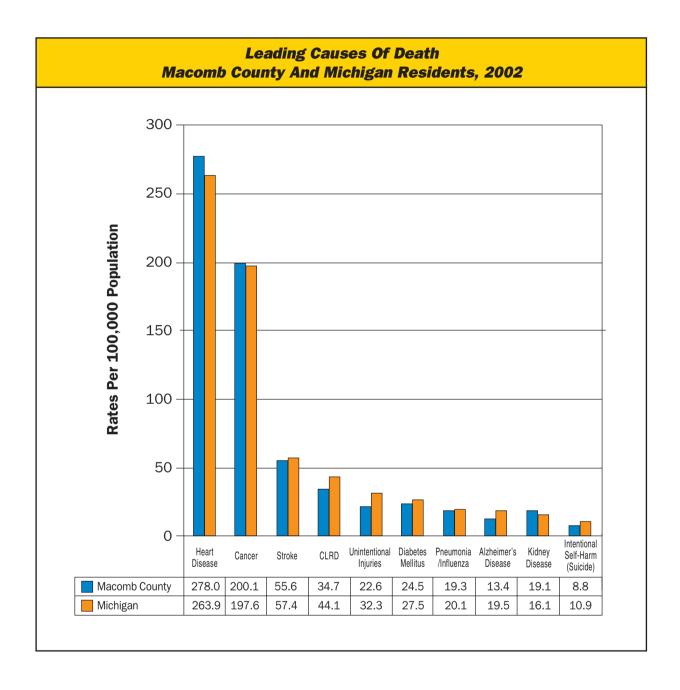
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CLRD - Chronic Lower Respiratory Disease

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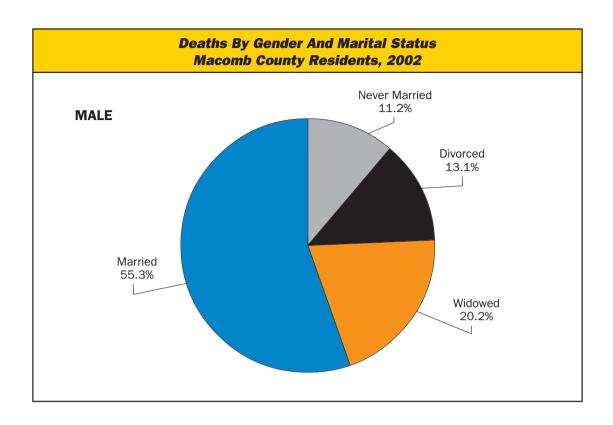
Notes: Age-adjusted rates are per 100,000 population.

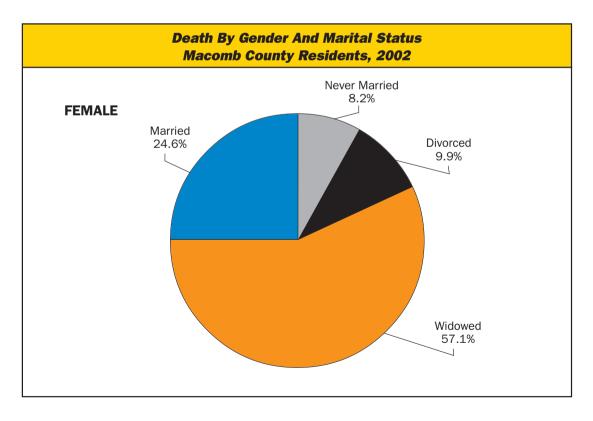
2002 Michigan Resident Death File, Division for Vital Records and Health Statistics, Michigan Department of Community Health.

Office of the State Demographer, Michigan Department of Management and Budget.

CLRD - Chronic Lower Respiratory Disease.

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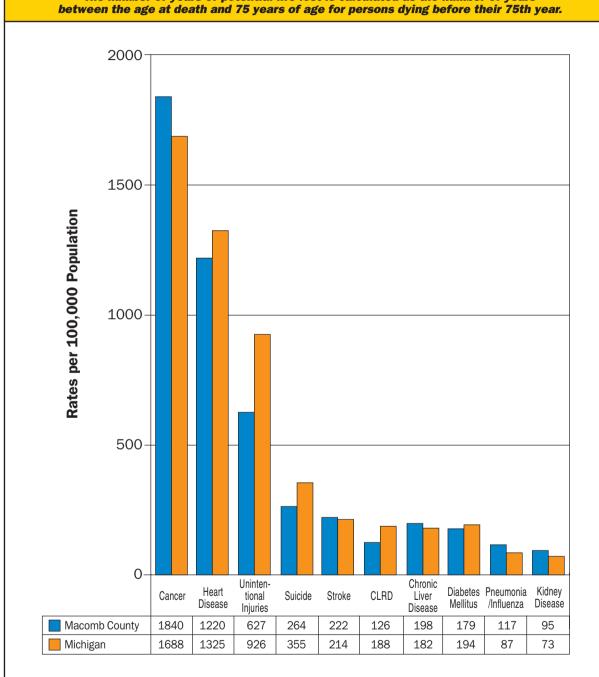


Notes: Divorced includes legally separated.

2002 Michigan Resident Death File, Division for Vital Records and Health Statistics, Michigan Department of Community Health.

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Rates Of Years Of Potential Life Lost Below Age 75, **Due To Selected Causes Of Death, 2002** The number of years of potential life lost is calculated as the number of years



Notes: The years of potential life lost below age 75 is a measure of mortality designed to emphasize mortality which is prevalent among people under age 75. The number of years of potential life lost is calculated as the number of years between the age at death and 75 years of age for persons dying before their 75th year.

Rates are per 100,000 population.

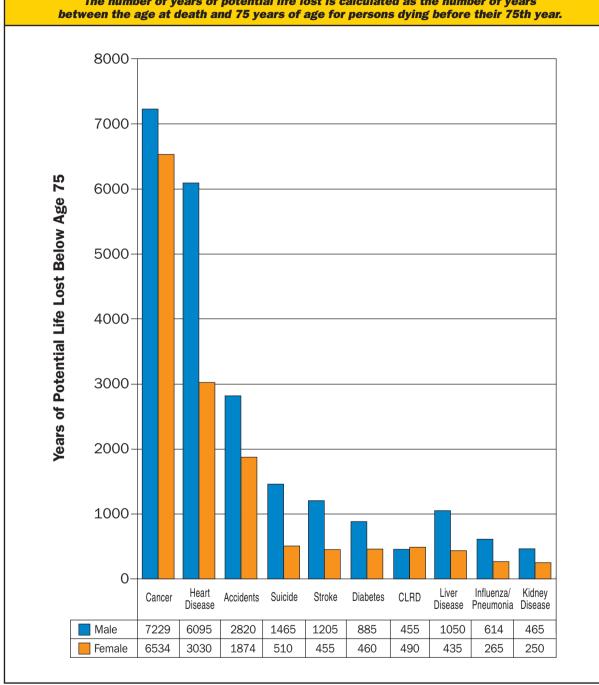
2002 Michigan Resident Death File, Division for Vital Records and Health Statistics, Michigan Department of Community Health; Office of the State Demographer, Michigan Department of Management and Budget.

CLRD - Chronic Lower Respiratory Disease.

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Years Of Potential Life Lost Below Age 75, By Sex, Due To Selected Causes Of Death **Macomb County Residents, 2002**

The number of years of potential life lost is calculated as the number of years



Notes: The years of potential life lost below age 75 is a measure of mortality designed to emphasize mortality which is prevalent among people under age 75. The number of years of potential life lost is calculated as the number of years between the age at death and 75 years of age for persons dying before their 75th year.

2002 Michigan Resident Death File, Division for Vital Records and Health Statistics, Michigan Department of Community Health; Office of the State Demographer, Michigan Department of Management and Budget.

CLRD - Chronic Lower Respiratory Disease.

Maternal and Child Health - Section E

Number of Live Births by Minor Civil Division of Residence, 1995 - 2002 (table)	E 1
Live Births by Age of Mother and Minor Civil Division of Residence, 2002 (table)	E 2
Live Births by Race of Mother and Minor Civil Division of Residence, 2002 (table)	E 3
Selected Characteristics of Mother by Age, Macomb County Resident, 2002 First Births by Age of Mother/ Births to Women with Less than 12 th Grade Education	E 4
Five Prenatal Visits or Less by Age of Mother/ No Prenatal Visits by Age of Mother	E 5
Low Birth Weight, Below 2500 Grams by Age of Mother/ Very Low Birth Weight, Below 1500 Grams by Age of Mother	E 6
Other Selected Birth Characteristics, Maternal and Infant, 2002	E 7
Live Births and Estimated Pregnancies by Age, Macomb County and Michigan, 2002	E 8
Live Births with Prenatal Care Beginning in First Trimester by Age, Macomb County and Michigan, 2002	E 9

Number Of Live Births By Minor Civil Division Of Residence Macomb County Residents 1995-2002

1995-2002								
MINOR CIVIL DIVISION	1995	1996	1997	1998	1999	2000	2001	2002
TOTAL	9,735	9,885	9,776	9,897	9,899	10,332	10,105	10,048
ARMADA VILLAGE	35	36	32	47	59	59	38	39
CENTER LINE CITY	106	101	88	105	100	106	79	90
EASTPOINTE	479	462	423	424	400	458	409	383
FRASER CITY	164	170	173	162	159	163	156	154
GROSSE PTE SHORES-PT VILLAGE	1	1	1	1	1	1	1	2
MEMPHIS-PT CITY	16	12	13	12	9	13	3	9
MT CLEMENS CITY	307	281	256	271	255	263	240	226
NEW BALTIMORE-PT CITY	163	172	165	196	168	206	236	230
NEW HAVEN-PT VILLAGE	39	41	58	52	79	66	47	76
RICHMOND CITY	77	58	73	82	106	73	88	78
ROMEO VILLAGE	87	113	91	67	82	79	98	98
ROSEVILLE CITY	728	739	672	644	660	641	640	651
ST CLAIR SHORES CITY	735	697	693	646	675	663	614	623
STERLING HEIGHTS CITY	1,456	1,540	1,513	1,532	1,549	1,522	1,516	1,530
UTICA CITY	169	198	195	166	155	164	166	162
WARREN CITY	1,787	1,840	1,834	1,767	1,687	1,770	1,736	1,654
ARMADA TOWNSHIP	25	33	28	30	11	12	31	25
BRUCE TOWNSHIP	46	46	33	44	29	43	35	38
CHESTERFIELD TOWNSHIP	361	387	393	448	517	580	603	556
CLINTON TOWNSHIP	1,276	1,228	1,200	1,235	1,189	1,173	1,146	1,107
HARRISON TOWNSHIP	286	306	313	303	309	289	266	251
LAKE TOWNSHIP	0	0	0	2	0	0	0	0
LENOX TOWNSHIP	53	54	57	59	48	37	62	39
MACOMB TOWNSHIP	529	528	623	689	761	951	998	1,096
RAY TOWNSHIP	37	45	47	48	39	36	33	33
RICHMOND TOWNSHIP	25	22	20	30	12	26	21	23
SHELBY TOWNSHIP	569	572	574	608	640	721	644	647
WASHINGTON TOWNSHIP	173	199	201	223	197	209	198	228
UNKNOWN MCD	6	4	7	4	3	8	1	0

Notes: Minor civil division (MCD) data contained in vital statistics data files, and reports developed from the files, are based upon the information supplied to the department in the course of registering vital events. Special studies of MCD data quality revealed that there are inaccuracies in these data. The degree of inaccuracy encountered is as high as 25 percent. Any use of these data, especially for comparisons across MCDs, may be affected by inaccurate reporting. The most common mis-allocation error occurs with smaller cities or villages, surrounded by a township. People providing information for the vital record stipulate that the subject of the vital record or the decedent lives in a city, rather than in a township which was their actual residence. This is usually because the subjects post office address is the city. When rates are calculated from these data differ substantially from state or county rates, the analyst should determine if events were allocated to the proper MCD. Division for Vital Records and Health Statistics, Michigan Department of Community Health.

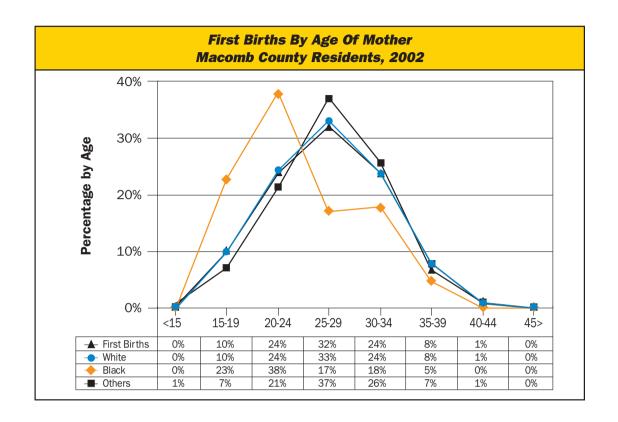
MINOR CIVIL DIVISION	TOTAL	< 15	15-19	20-24	25-29	30-34	35-39	40-44	45 +	UNKNOWN
TOTAL	10,048	3	509	1,808	3,011	3,164	1,325	217	9	2
ARMADA VILLAGE	39	0	0	9	12	12	5	1	0	(
CENTER LINE CITY	90	0	6	23	26	27	5	3	0	(
EASTPOINTE	383	1	27	73	122	112	38	9	1	(
FRASER CITY	154	0	9	23	52	42	23	5	0	(
GROSSE PTE SHORES-PT VILLAGE	2	0	0	0	0	0	2	0	0	(
MEMPHIS-PT CITY	9	0	1	4	2	2	0	0	0	
MT CLEMENS CITY	226	0	21	69	55	57	18	5	1	
NEW BALTIMORE-PT CITY	230	0	14	42	73	65	34	2	0	
NEW HAVEN-PT VILLAGE	76	0	11	21	26	15	3	0	0	
RICHMOND CITY	78	0	6	10	28	26	5	3	0	
ROMEO VILLAGE	98	0	9	14	26	30	18	1	0	
ROSEVILLE CITY	651	0	47	159	193	181	59	12	0	
ST CLAIR SHORES CITY	623	0	32	69	168	243	97	12	2	
STERLING HEIGHTS CITY	1,530	0	42	242	505	481	230	28	2	
JTICA CITY	162	0	7	67	51	26	8	3	0	
WARREN CITY	1,654	2	127	366	505	446	174	34	0	
ARMADA TOWNSHIP	25	0	2	3	7	5	6	2	0	
BRUCE TOWNSHIP	38	0	1	4	9	14	8	2	0	
CHESTERFIELD TOWNSHIP	556	0	22	64	171	207	79	12	1	
CLINTON TOWNSHIP	1,107	0	64	261	310	311	138	23	0	
HARRISON TOWNSHIP	251	0	11	48	61	70	53	7	0	
_AKE TOWNSHIP	0	0	0	0	0	0	0	0	0	
LENOX TOWNSHIP	39	0	2	10	16	6	4	1	0	
MACOMB TOWNSHIP	1,096	0	22	113	341	445	155	19	0	
RAY TOWNSHIP	33	0	0	2	10	14	7	0	0	
RICHMOND TOWNSHIP	23	0	0	2	6	12	2	1	0	
SHELBY TOWNSHIP	647	0	16	71	175	233	125	25	2	
WASHINGTON TOWNSHIP	228	0	10	39	61	82	29	7	0	(
UNKNOWN MCD	0	0	0	0	0	0	0	0	0	

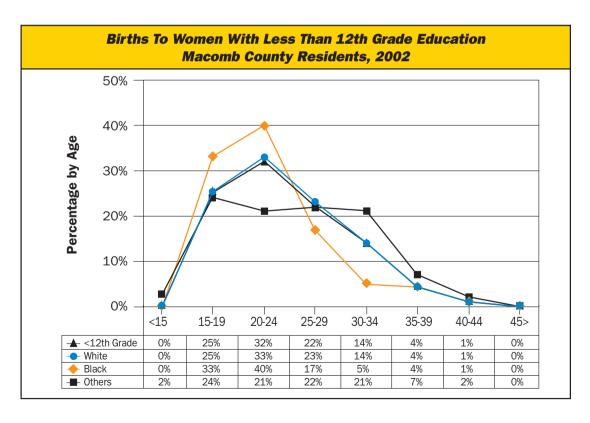
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Live Births By Race Of Mother And Minor Civil Division Of Residence Macomb County Residents, 2002

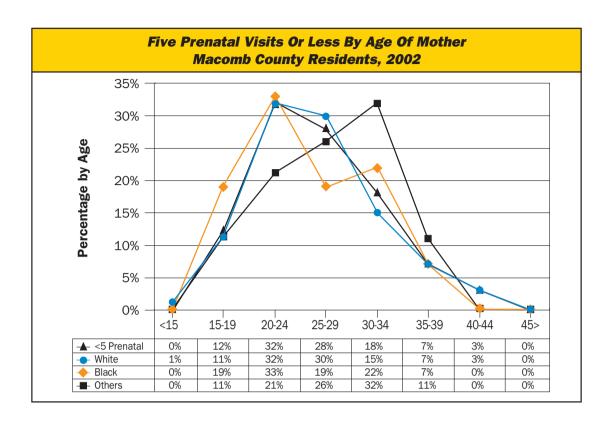
MINOR ON A RIVIGION	T0741	NA/1117	DI AOY	AMERICAN	ACIANI (DI	OTUED.	LINUALOMAI
MINOR CIVIL DIVISION	TOTAL	WHITE	BLACK	INDIAN	ASIAN/PI	OTHER	UNKNOWN
TOTAL	10,048	8,887	511	31	510	34	75
ARMADA VILLAGE	39	39	0	0	0	0	0
CENTER LINE CITY	90	75	9	0	5	0	1
EASTPOINTE	383	324	41	1	13	1	3
FRASER CITY	154	147	4	1	2	0	0
GROSSE PTE SHORES-PT VILLA	GE 2	2	0	0	0	0	0
MEMPHIS-PT CITY	9	9	0	0	0	0	0
MT CLEMENS CITY	226	180	41	1	2	0	2
NEW BALTIMORE-PT CITY	230	213	11	1	4	0	1
NEW HAVEN-PT VILLAGE	76	71	5	0	0	0	0
RICHMOND CITY	78	76	0	0	2	0	0
ROMEO VILLAGE	98	96	1	0	0	0	1
ROSEVILLE CITY	651	585	41	3	19	0	3
ST CLAIR SHORES CITY	623	592	9	4	15	0	3
STERLING HEIGHTS CITY	1,530	1,262	50	1	186	14	17
UTICA CITY	162	135	4	0	21	2	0
WARREN CITY	1,654	1,383	109	13	132	9	8
ARMADA TOWNSHIP	25	24	0	0	0	0	1
BRUCE TOWNSHIP	38	37	0	0	1	0	0
CHESTERFIELD TOWNSHIP	556	524	17	2	5	1	7
CLINTON TOWNSHIP	1,107	938	123	2	34	2	8
HARRISON TOWNSHIP	251	234	13	0	4	0	0
LAKE TOWNSHIP	0	0	0	0	0	0	0
LENOX TOWNSHIP	39	38	1	0	0	0	0
MACOMB TOWNSHIP	1,096	1,018	23	1	44	1	9
RAY TOWNSHIP	33	32	0	0	0	0	1
RICHMOND TOWNSHIP	23	23	0	0	0	0	0
SHELBY TOWNSHIP	647	610	9	0	19	3	6
WASHINGTON TOWNSHIP	228	220	0	1	2	1	4
UNKNOWN MCD	0	0	0	0	0	0	0

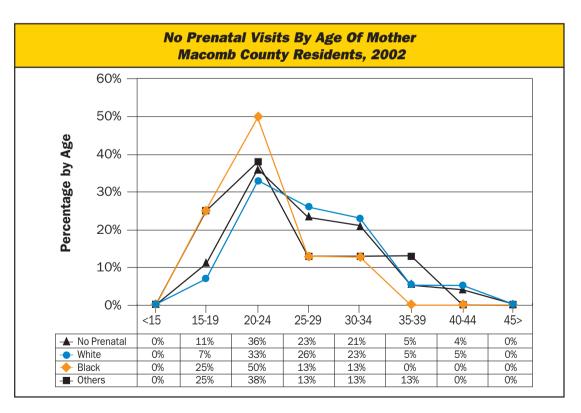
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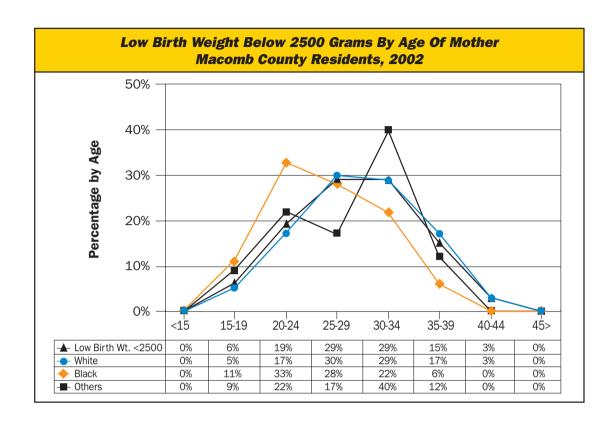


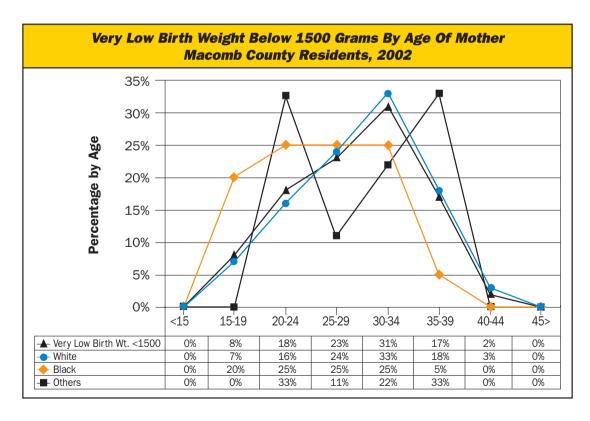


Notes: Division for Vital Records and Health Statistics, Michigan Department of Community Health.

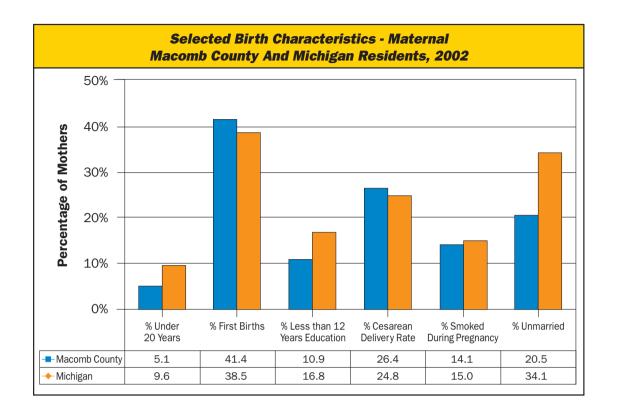


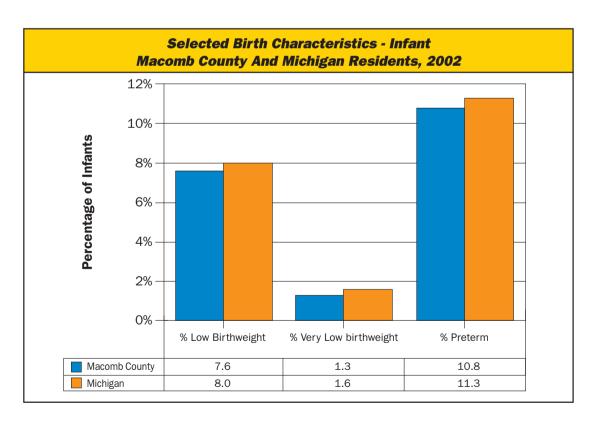






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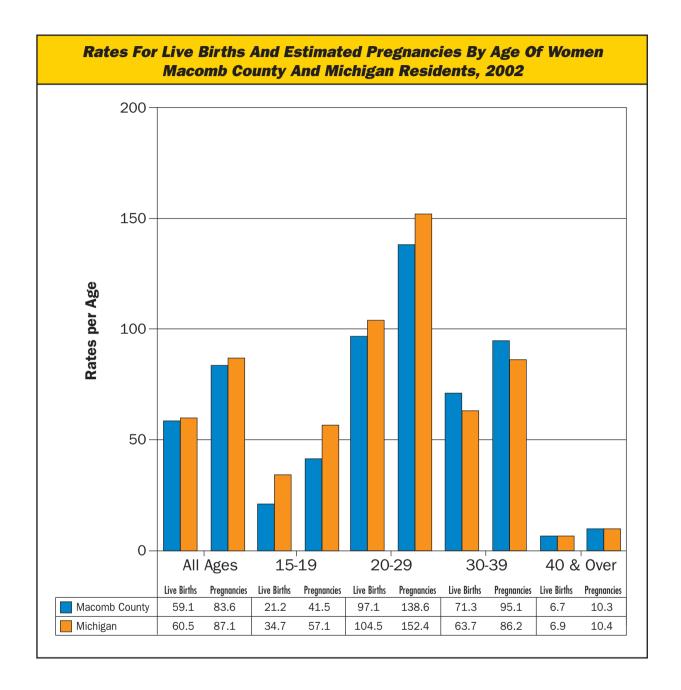
Notes: Low birthweight less than 2500 grams.

Very low birthweight less than 1500 grams.

Preterm births are infants born prior to 37 completed weeks of gestation.

Michigan 2002 Resident Birth files, Division for Vital Records and Health Statistics, Michigan Department of Community Health.

"A Public Health Profile"



Note

Estimated pregnancies are the sum of live births, induced abortions and estimated miscarriages. Estimated miscarriages are calculated by adding 20% of the live births and 10% of the induced abortions.

Births or estimated pregnancies with age of woman not stated are included in the total row only.

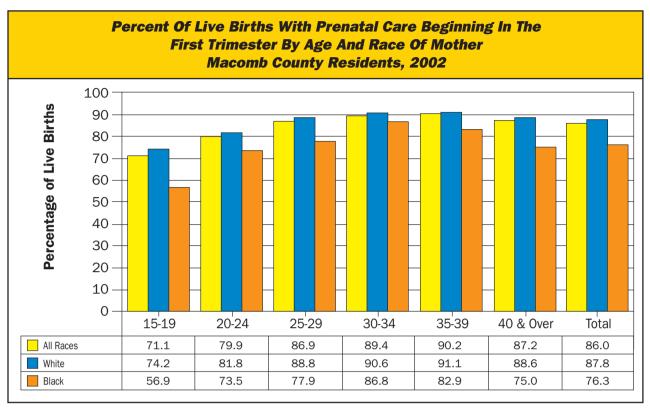
Rates per 1,000 age - specific female population.

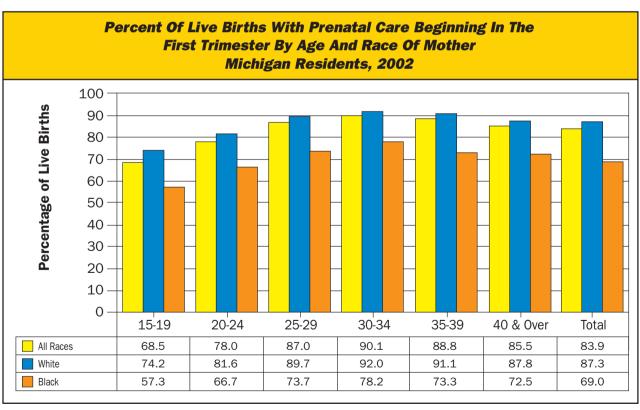
 ${\bf 40~\&~Over}$ rates are calculated using 40-44 female population.

Total includes unknown age or females ages 14 and younger.

Source: Michigan Resident Birth and Reported Induced Abortion Files, Vital Records & Health Data Development Section, Michigan Department of Community Health; Office of the State Demographer.

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Note: Percents are calculated by using live births to mothers in the specific age and race group as the denominator. Records with race not stated are included only in the "All Races" column. Records with age of mother not stated are included only in the "total" row.

Source: 2002 Michigan Resident Birth File, Vital Records & Health Data Development Section, Michigan Department of Community Health

Death from Injuries - Section F

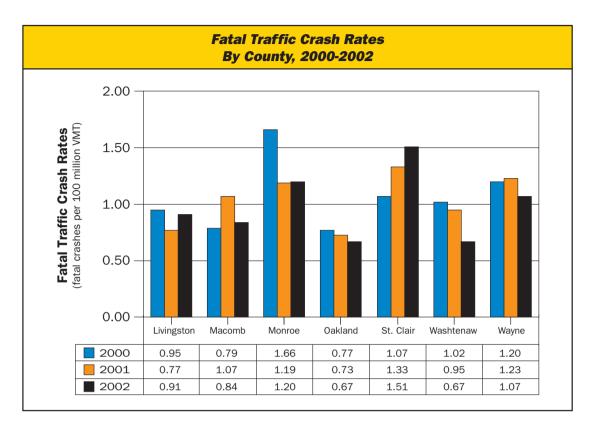
Traffic Crash Summary for Macomb County, 2002 (table)	F 1
Fatal Traffic Crash Rates by County, 2000 - 2002/ Fatal Traffic Crashes by County, 2000 - 2002	F 2
Macomb County Adult Drinking Status, 1996, 1999, 2002	F 3
Adults Who Binge Drink At Least Once in the Past Month, 2002/ Adults Who Drove After Having Too Much To Drink in the Past Month, 2002	F 4
Alcohol-Involved Traffic Crash Percentage by County, 2000 - 2002/ Alcohol-Involved Traffic Crashes by County, 2000 - 2002	F 5
Ambulance Crash Information, 1995 - 2002	F 6
Restraint Usage, Injuries and Fatality, Michigan Drivers, 2002/ Seat Belt Use, Macomb County	F 7
Suicide Death Rates, Macomb County and Michigan, 1993 - 2002/ Suicide Death Rates by Age, Macomb County and Michigan, 2002	F 8
Homicide Death Rates, Macomb County and Michigan, 1993 - 2002/ Homicide Death Rates by Age, Macomb County and Michigan, 2002	F 9
Unintentional Injury Rates, Macomb County and Michigan, 1993 - 2002/ Unintentional Injury Death Rates by Age, Macomb County and Michigan, 2002	F 10

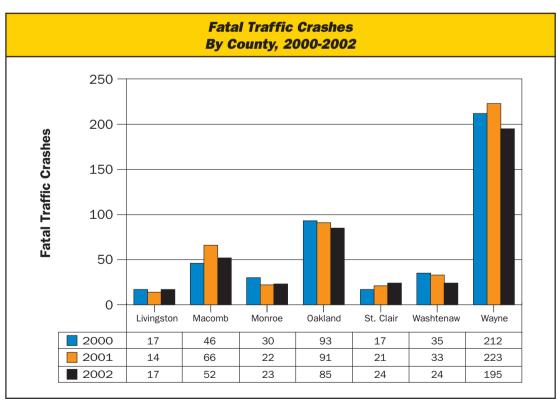
Traffic Crash Summary For Macomb County, 2002

	TOTAL Crashes	FATAL CRASHES	PERSONAL Injury Crashes	PROPERTY Damage Crashes	PERSONS KILLED	PERSON INJUREI
MACOMB COUNTY TOTAL	26,578	52	6,004	20,522	56	8,324
ARMADA	19	0	1	18	0	2
ARMADA TWP.	151	3	37	111	5	59
BRUCE TWP.	219	1	45	173	1	62
CENTER LINE	382	0	89	293	0	118
CHESTERFIELD TWP.	1,376	3	302	1,071	3	426
CLINTON TWP.	3,102	6	751	2,345	6	1,035
EASTPOINTE	776	2	146	628	2	218
FRASER	575	1	127	447	1	175
GROSSE POINTE SHORES	2	0	1	1	0	1
HARRISON TWP.	718	1	188	529	1	261
LAKE TOWNSHIP	1	0	0	1	0	C
LENOX TWP.	179	1	64	114	1	119
MACOMB TWP.	1,548	4	305	1,239	4	444
MEMPHIS	8	0	1	7	0	1
MT. CLEMENS	604	2	123	479	2	167
NEW BALTIMORE	230	0	56	174	0	80
NEW HAVEN	91	0	25	66	0	35
RAY TWP.	186	1	42	143	2	61
RICHMOND	156	0	39	117	0	49
RICHMOND TWP.	80	0	18	62	0	28
ROMEO	114	1	17	96	1	20
ROSEVILLE	2,570	2	615	1,953	2	844
ST. CLAIR SHORES	1,918	1	401	1,516	2	497
SHELBY TWP.	1,678	6	396	1,276	6	534
STERLING HEIGHTS	3,907	5	758	3,144	5	1,045
UTICA	432	0	79	353	0	108
WARREN	4,809	10	1,207	3,592	10	1,697
WASHINGTON TWP.	497	2	121	374	2	168
UNKNOWN COMMUNITY	250	0	50	200	0	68

Notes: SEMCOG, 2002

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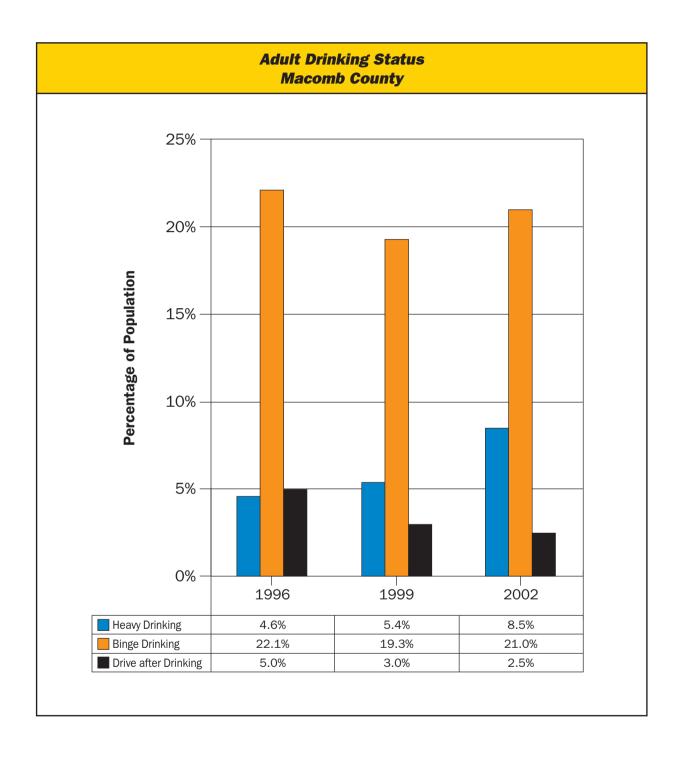




 $\textbf{Notes:} \ \textbf{Michigan State Police Traffic Crash Database and SEMCOG}, 2002$

VMT - Vehicle miles traveled

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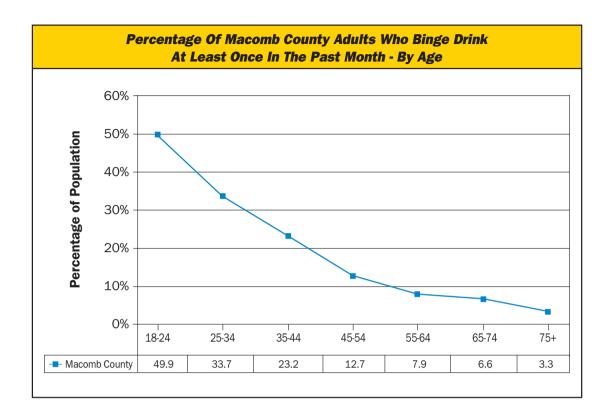
Heavy Drinking - Macomb County Adults who have had 60 or more drinks in the previous month.

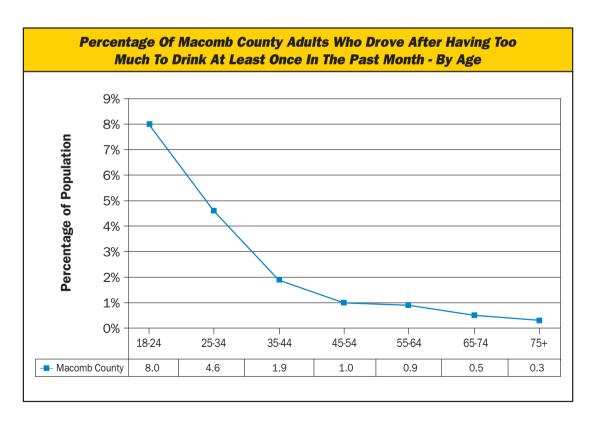
Binge Drinking - Macomb County Adults who consumed 5 or more drinks on at least one occasion in the past month.

Drove after Drinking - Macomb County Adults who drove after having too much to drink at lest once in the past month.

Notes: Macomb County 1996, 1999, 2002 Behavioral Risk Factor Survey - BRFS.
Behavioral Risk Factor Surveillance Data - Denominator excludes Missing, Don't Know, and Refusal Data.

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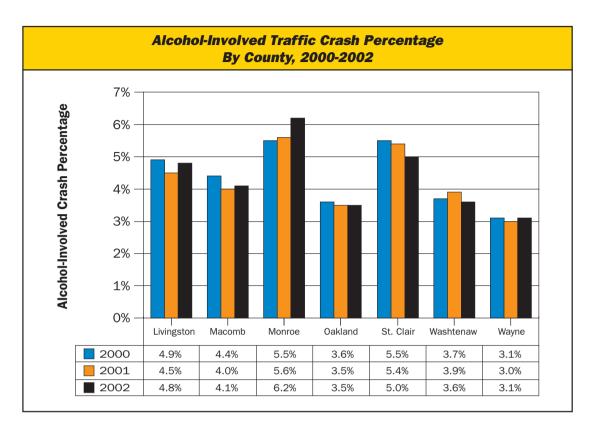


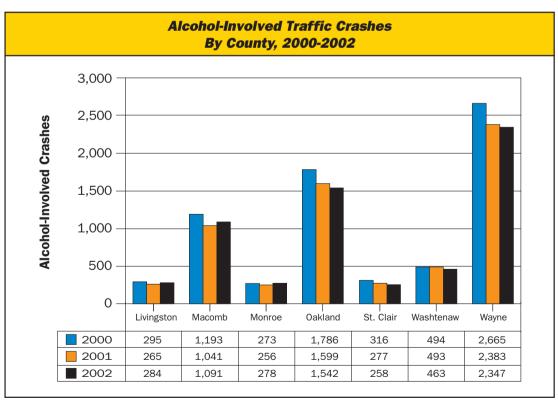
Notes: Macomb County 2002 Behavioral Risk Factor Survey - BRFS.

Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know and Refused Data.

Binge Drink - Having 5 or more drinks on a single occasion.

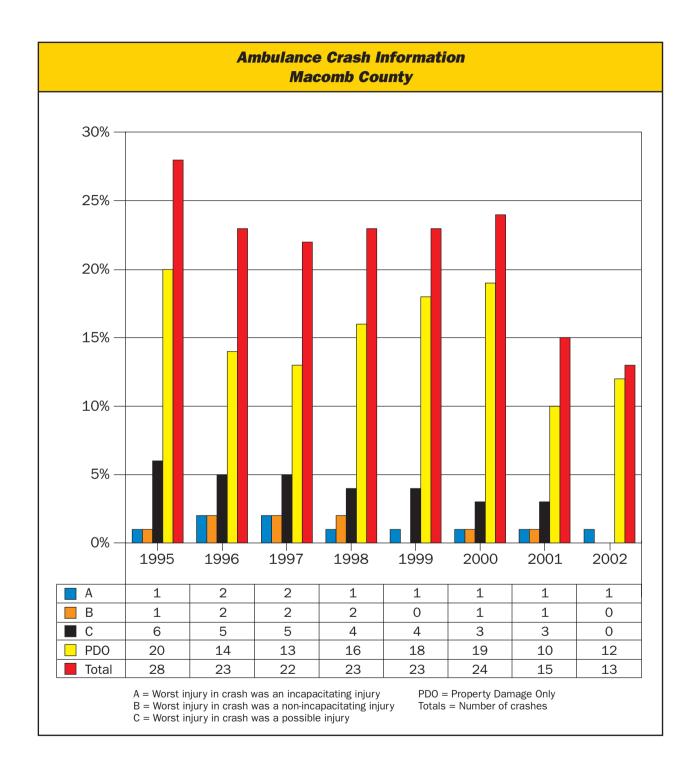
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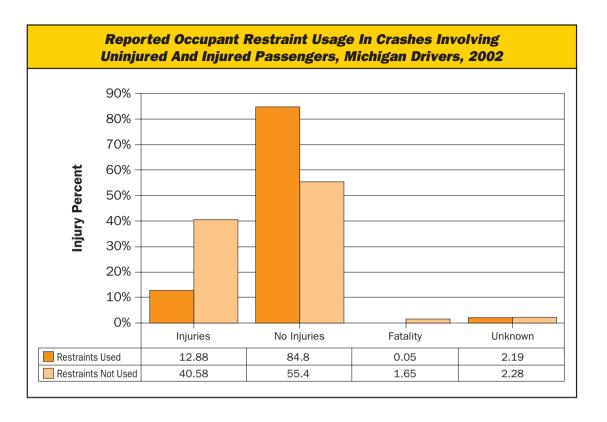
Notes: Michigan State Police Traffic Crash Database and SEMCOG, 2002.

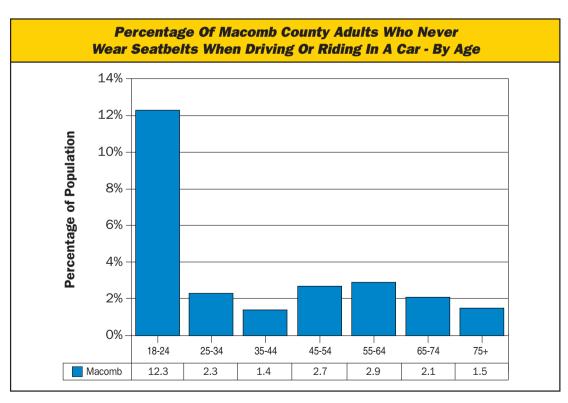
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Notes: SEMCOG, 2002

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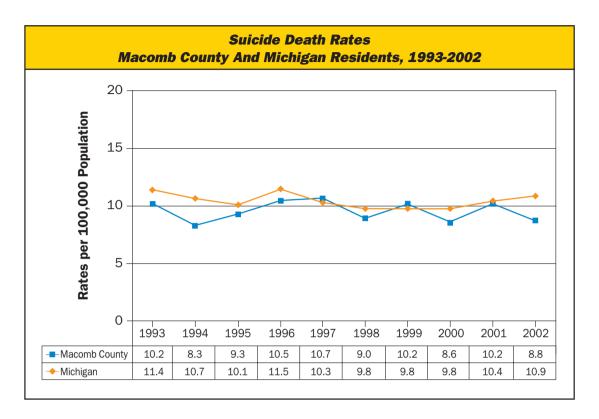


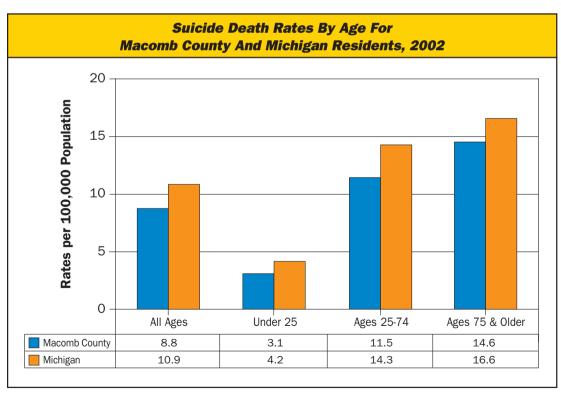
Notes: Reported Restraint Usage - Report to police at the scene of traffic crash (reported usage) 2002 Michigan Traffic Crash Facts, Michigan Department of State Police.

Macomb County 2002 Behavioral Risk Factor Survey - BRFS.

Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know and Refused Data.

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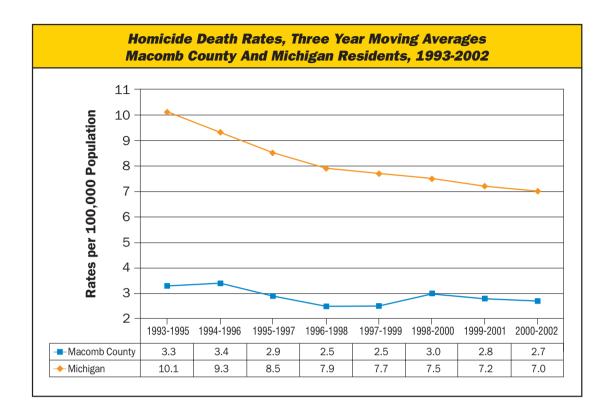


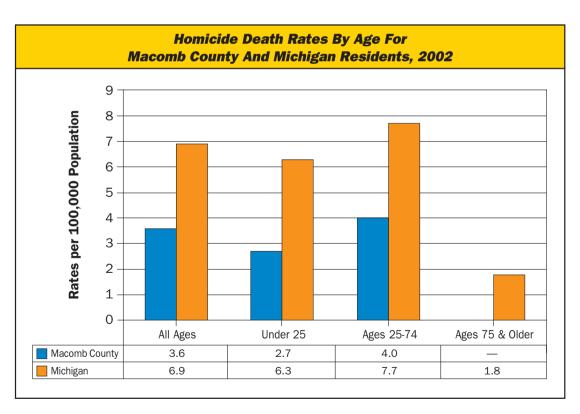
Notes

Suicide Death Rates: Rates are per 100,000. Computed by the direct method, using as the standard population the age distribution of the total population of the United States for the year 2000.

Source: 1989-2002 Michigan Resident Death Files, Vital Records & Health Data Development Section, Michigan Department of Community Health.

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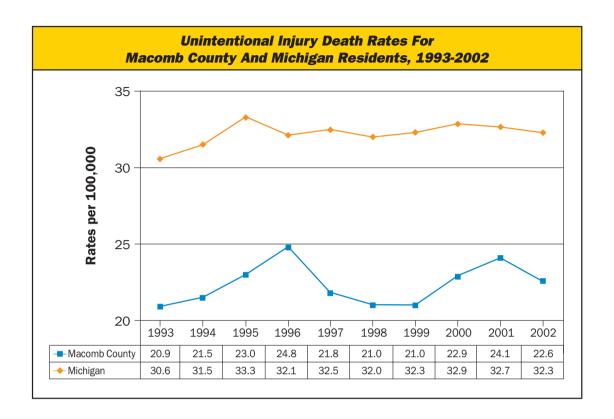


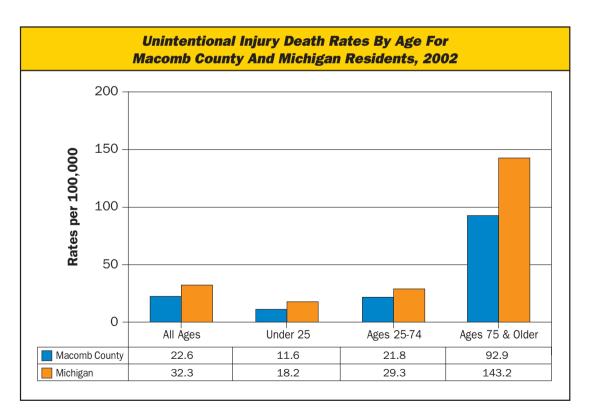


Notes:

Homicide Deaths: Rates are per 100,000. Computed by the direct method, using as the standard population the age distribution of the total population of the United States for the year 2000.

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Notes

Unintentional Injury Death Rates: Rates are per 100,000. Computed by the direct method, using as the standard population the age distribution of the total population of the United States for the year 2000.

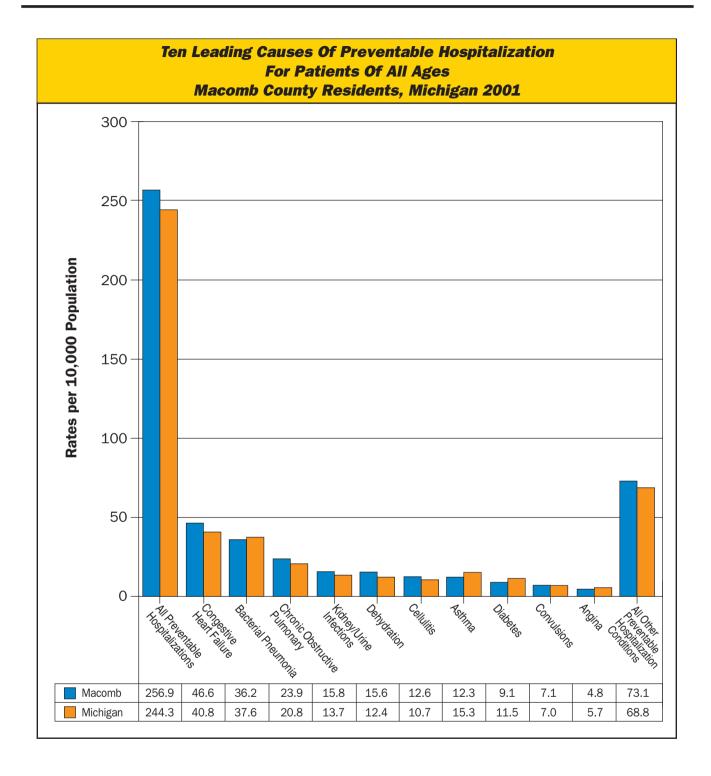
1989-2002 Michigan Resident Death Files, Vital Records & Health Data Development Section, Michigan Department of Community Health.

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Preventable Hospitalization - Section G

Ten Leading Causes of Preventable Hospitalizations, Macomb County and Michigan Residents, 2001	G 1
Preventable Hospitalization Trends, Macomb County and Michigan Residents, 1994 – 2001	G 2

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Notes:

Preventable Hospitalizations are hospitalizations for conditions where timely and effective ambulatory care can decrease hospitalizations by preventing the onset of an illness or condition, controlling an acute episode of an illness or managing a chronic disease or condition.

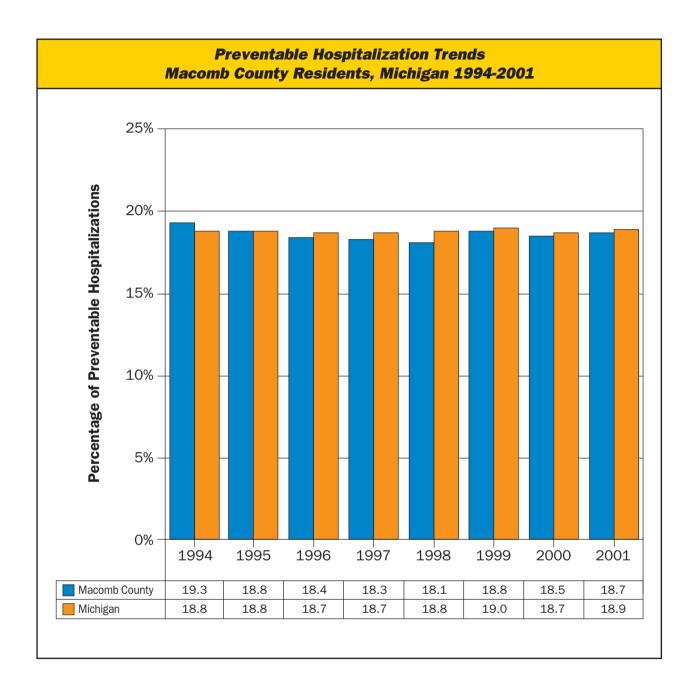
Hospitalizations are inpatient hospital stays as measured by stays that were completed during the specified year. The number of hospitalizations is often greater than the number of persons hospitalized since some persons are hospitalized more than once during a year.

Rates are per 10,000 population in the area for the specified year or years.

Census 2000 was used to calculate rates for 2001.

Source: Michigan Resident Inpatient Files, Division for Vital Records and Health Statistics, Michigan Department of Community Health.

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Notes: Preventable Hospitalizations are hospitalizations for conditions where timely and effective ambulatory care can decrease hospitalizations by preventing the onset of an illness or condition, controlling an acute episode of an illness or managing a chronic disease or condition.

Hospitalizations are inpatient hospital stays as measured by stays that were completed during the specific year. The number of hospitalizations is often greater than the number of persons hospitalized since some persons are hospitalized more than once during a year.

 $\textbf{Percent} \ of \ all \ hospitalizations \ that \ were \ categorized \ as \ preventable \ hospitalizations \ for \ the \ specific \ year.$

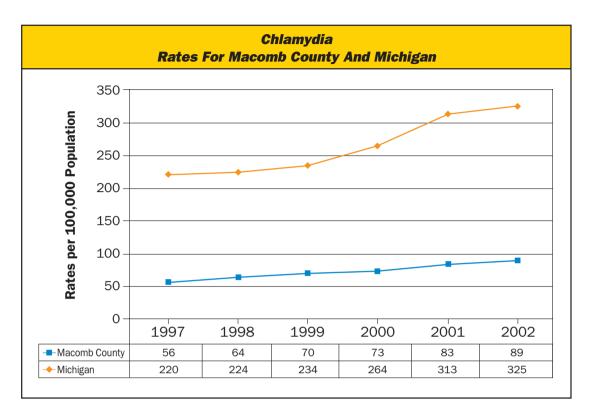
Source: Michigan Resident Inpatient Files, Division for Vital Records and Health Statistics, Michigan Department of Community Health.

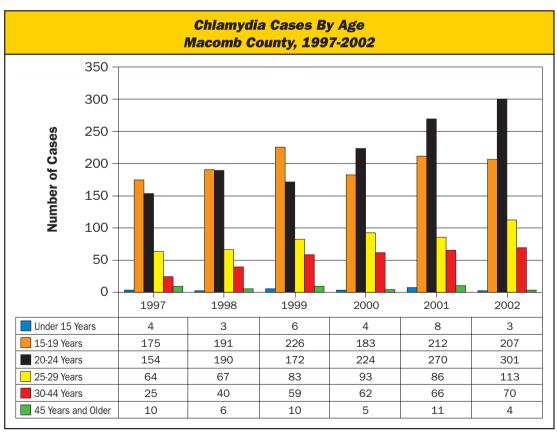
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Communicable Diseases - Section H

Chlamydia Rates, Macomb County and Michigan Residents, 1997 - 2002/ Chlamydia Cases by Age, Macomb County, 1997 - 2002	H 1
Gonorrhea Rates, Macomb County and Michigan Residents, 1997 - 2002/ Gonorrhea Cases by Age, Macomb County, 1997 - 2002	H 2
Syphilis Rates, Macomb County and Michigan Residents, 1997 - 2002/ Syphilis Cases by Age, Macomb County, 1997 - 2002	Н3
HIV/AIDS by County, 1981 - 7/1/03	H 4
Communicable Disease Summary, Macomb County, 1999 - 2003	Н 5

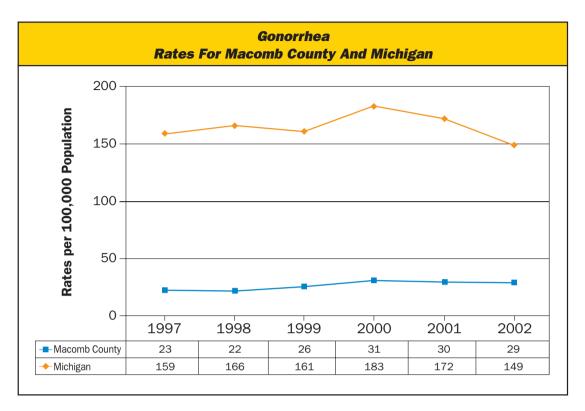
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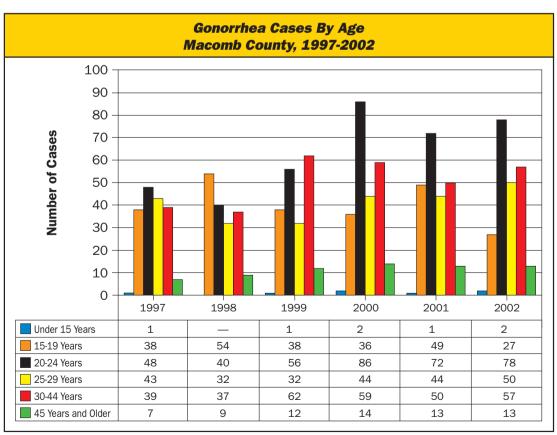




Notes: Michigan Sexually Transmitted Diseases Database, Sexually Transmitted Disease Section, Division of HIV/AIDS-STD, Michigan Department of Community Health; Table prepared by the Division for Vital Records and Health Statistics, Michigan Department of Community Health.

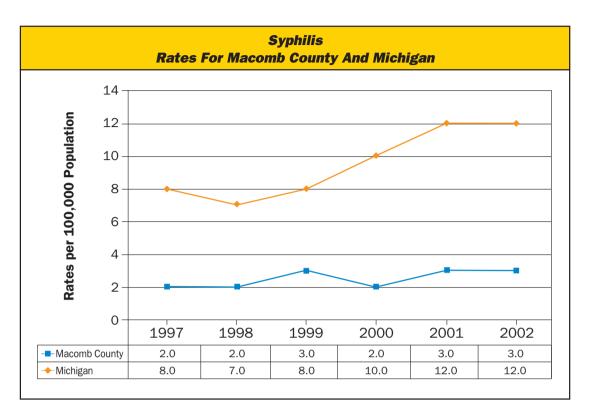
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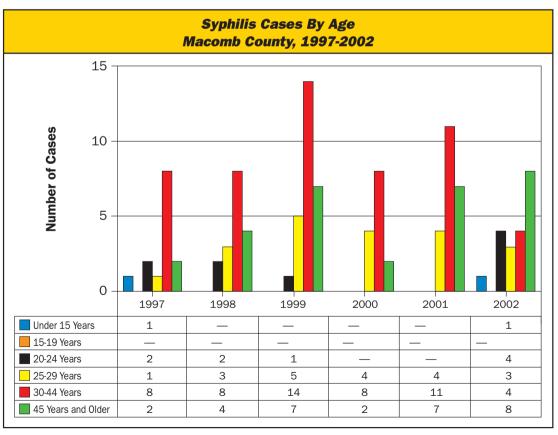




Notes: Michigan Sexually Transmitted Diseases Database, Sexually Transmitted Disease Section, Division of HIV/AIDS-STD, Michigan Department of Community Health; Table prepared by the Division for Vital Records and Health Statistics, Michigan Department of Community Health.

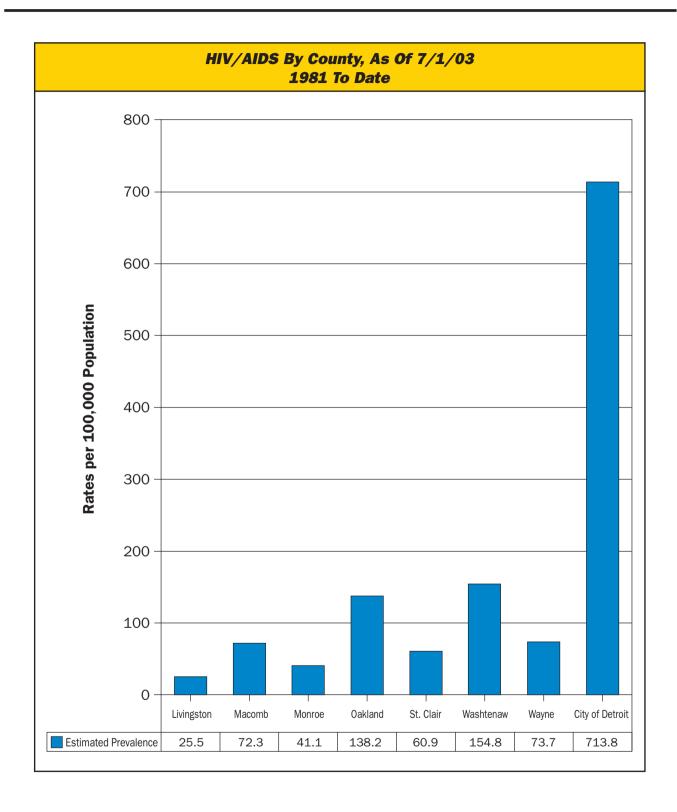
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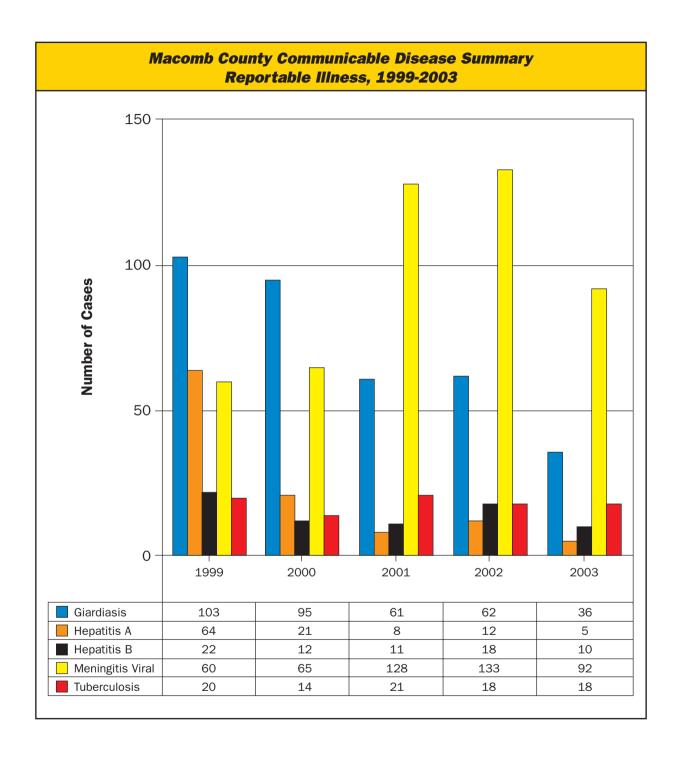
Notes: Michigan Sexually Transmitted Diseases Database, Sexually Transmitted Disease Section, Division of HIV/AIDS-STD, Michigan Department of Community Health; Table prepared by the Division for Vital Records and Health Statistics, Michigan Department of Community Health.

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Estimate includes all persons living with HIV or AIDS. Rates are calculated per 100,000 population in 2000. **Notes:** HIV/AIDS Surveillance Section Communicable Disease and Immunization Division Bureau of Epidemiology

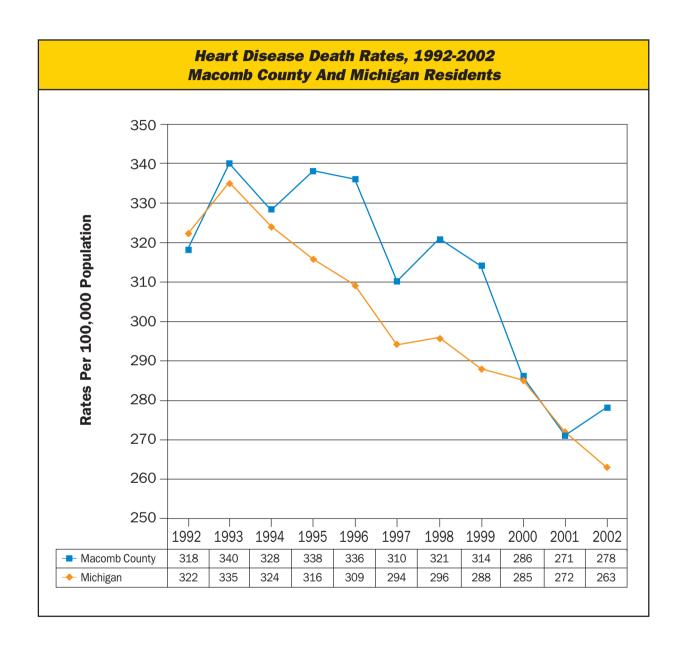
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Chronic Disease: Conditions and Risk Factors - Section I

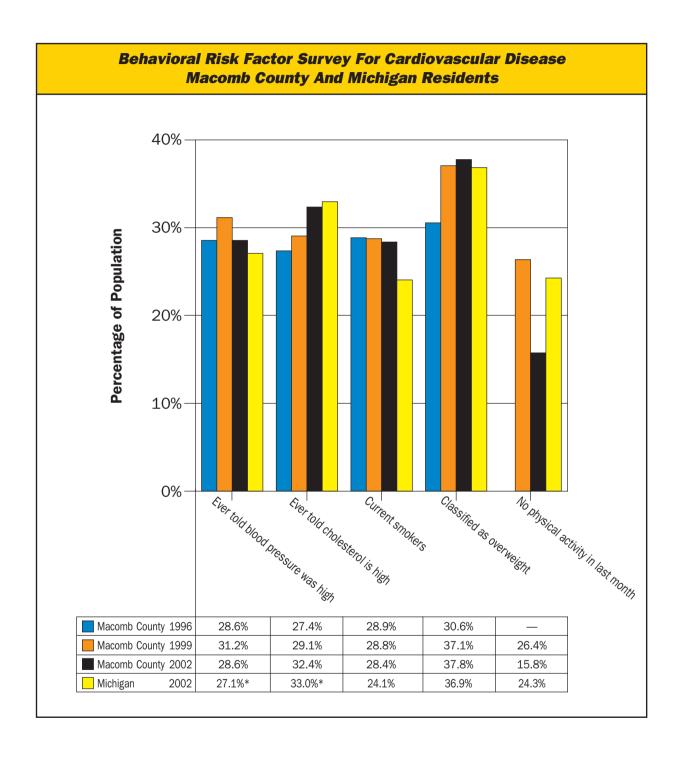
Heart Disease Mortality Rates, Macomb County and Michigan, 1992 – 2002	11
Cardiovascular Disease - Behavioral Risk Factors, 1996, 1999, 2002	12
Cardiovascular Risk Factors by Gender, 1996, 1999, 2002	13
Cardiovascular Disease Indicators for 45 Years and Older, Macomb County and Michigan, 2002	۱4
Current Smokers, Macomb County Adults by Age 2002/ Invasive Lung Cancer Mortality Trends, Macomb County and Michigan Residents, 1992 – 2002	15
Percentage of Macomb County Adults Who Were Told They Have High Blood Pressure by Age, 2002/ Stroke Death Rates, Macomb County and Michigan Residents, 1993 – 2002	16
Percentage of Macomb County Adults Who Have Ever Had Blood Cholesterol Checked by Age, 2002/ Percentage of Macomb County Adults Who Have Ever Been Told Cholesterol Is High, by Age, 2002	I 7
No Physical Activity in Last Month by Age, Macomb County Adults, 2002/ Percentage of Macomb County Adults Who Are Overweight by Age, 2002	18
Percent of Adults Who Have Diabetes, Macomb County and Michigan/ Percent of Macomb County Adults Who Were Told They Have Diabetes by Age	19
Prevalence of Breast Cancer Screening, Macomb County/ Invasive Breast Cancer Mortality Trends, Macomb County and Michigan Residents, 1992 – 2002	I 10
Prevalence of Colorectal Cancer Screening, Macomb County/ Invasive Colorectal Cancer Mortality Trends, Macomb County and Michigan Residents, 1992 – 2002	l 11



Notes: Age-adjusted death rates are based on age-specific death rates per 100,000 population in specified group.

Population Estimates from Division of Vital Records and Health Statistics, MDCH using Population Estimates prepared by the Office of the State Demographer, Michigan Department of Management and Budget.

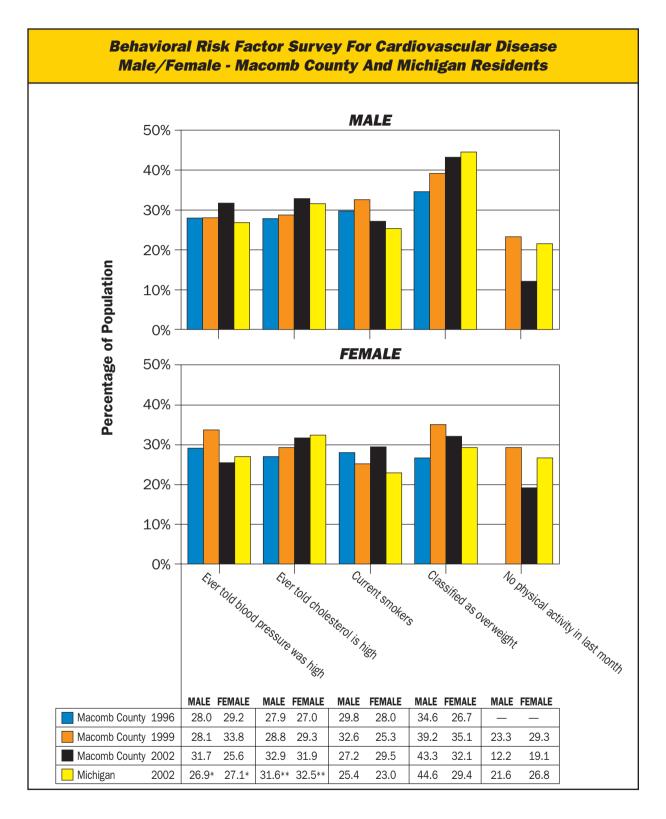
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Notes: Macomb County - Overweight by body mass index - Body Mass Index 27.8 kg/m² or greater for Males and 27.3 kg/m² or greater for Females. MI - Overweight body mass index 25.0 kg/m² - 29.9 kg/m². Michigan 2002 BRFS Summary Prevalence Report, Behavioral Surveillance Branch of Adult and Community Health, National Center for Chronic Disease Prevention, Centers for Disease Control and Prevention.

Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know and Refused Data. *2001 Michigan BRFSS data used.

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Notes: Macomb County - Overweight by body mass index - Body Mass Index 27.8 kg/m² or greater for Males and 27.3 kg/m² or greater for Females. MI - Overweight body mass index 25.0 kg/m² - 29.9 kg/m². Michigan 2002 BRFS Summary Prevalence Report, Behavioral Surveillance Branch of Adult and Community Health, National Center for Chronic Disease Prevention, Centers for Disease Control and Prevention.

Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know and Refused Data.

^{*2001} Michigan BRFSS data used.

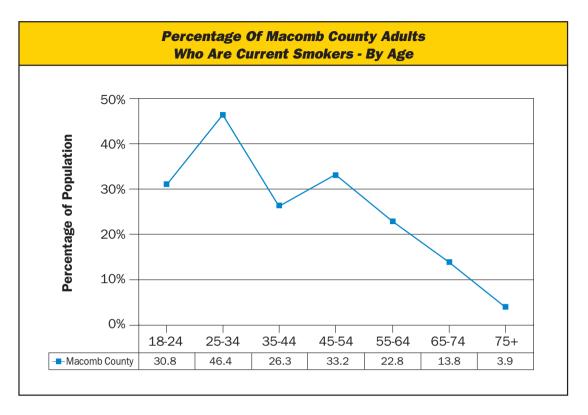
^{**1999} Michigan BRFSS data used.

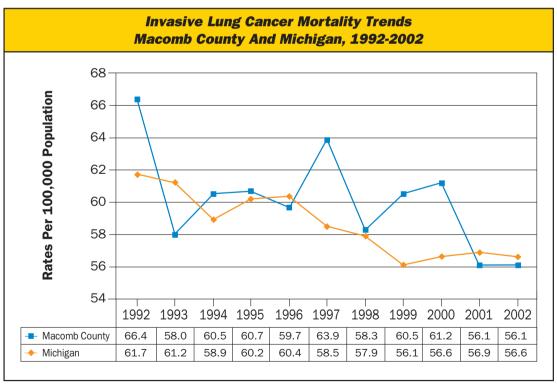
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Cardiovascular Disease Indicators For 45 Years And Older Macomb County And Michigan Residents

	attack or	Ever told had heart attack or myocardial infarction		nad angina ary heart ease	Ever told had a stroke		
DEMOGRAPHIC CHARACTERISTICS	МС	MI	МС	MI	мс	MI	
Gender							
Male	2.4 ± 1.4	9.9 ± 1.7	3.3 ± 1.4	8.8 ± 1.5	0.9 ± 0.6	3.9 ± 1.1	
Female	1.2 ± 1.0	4.7 ± 1.0	4.4 ± 2.1	5.5 ± 1.1	2.3 ± 1.9	3.9 ± 0.9	
Age							
45-54 Years	1.5 ± 1.7	3.5 ± 1.4	3.7 ± 3.9	3.9 ± 1.5	3.1 ± 3.5	1.6 ± 1.0	
55-64 Years	3.8 ± 3.8	8.6 ± 2.4	5.9 ± 4.7	10.8 ± 2.7	0.1 ± 0.2	4.7 ± 1.8	
65-74 Years	5.3 ± 3.3	15.1 ± 3.4	12.0 ± 5.9	15.7 ± 3.5	3.1 ± 2.0	6.7 ± 2.4	
>75 Years	6.7 ± 6.6	20.7 ± 4.5	16.9 ± 7.2	14.9 ± 3.8	4.5 ± 3.7	11.6 ± 3.6	

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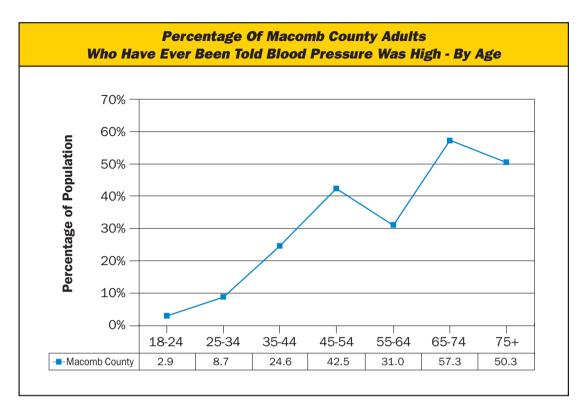
Notes: Current Smokers - Macomb County 2002 Behavioral Risk Factor Survey - BRFS

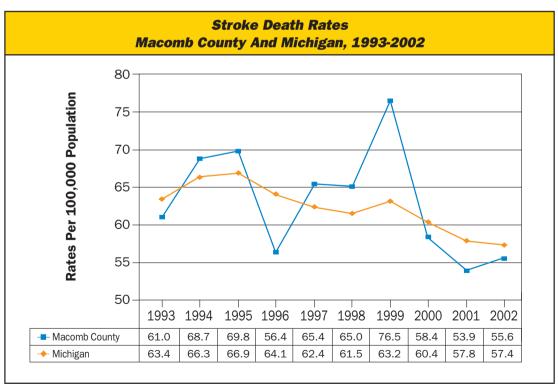
Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know and Refused Data.

Age-Adjusted Rate is per 100,000 population. Rates are computed by the direct method, using as the standard population the age distribution of the total population of the United States as enumerated in 2000.

Source of Michigan Death Data: Michigan Resident Death Files, Michigan Department of Community Health, Division for Vital Records and Health Statistics.

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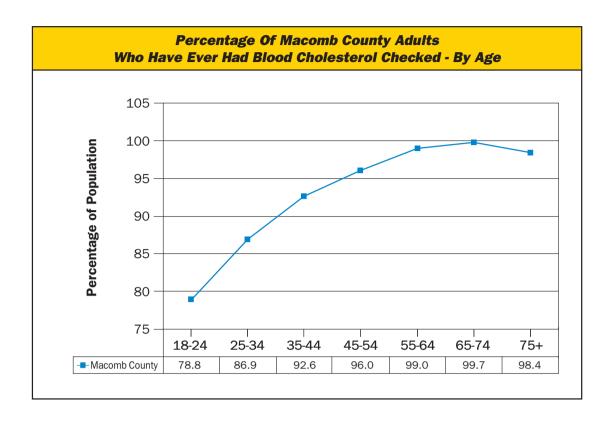
Notes: Blood Pressure - Macomb County 2002 Behavioral Risk Factor Survey - BRFS.

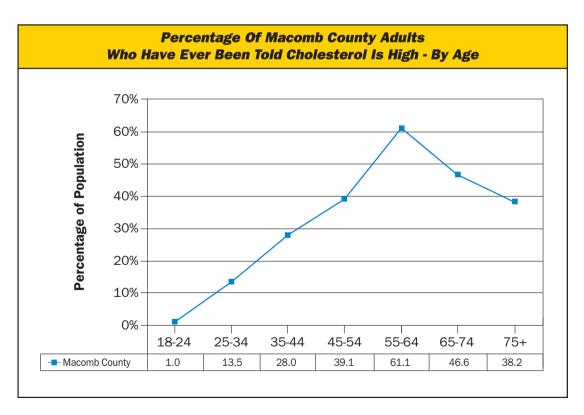
Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know and Refused Data.

Stroke Death Rates: Rates are per 100,000. Computed by the direct method, using as the standard population the age distribution of the total population of the United States as enumerated in 2000.

Source: Michigan Resident Death Files, Division for Vital Records and Health Statistics, MDCH; Office of the State Demographer, Michigan Department of Management and Budget.

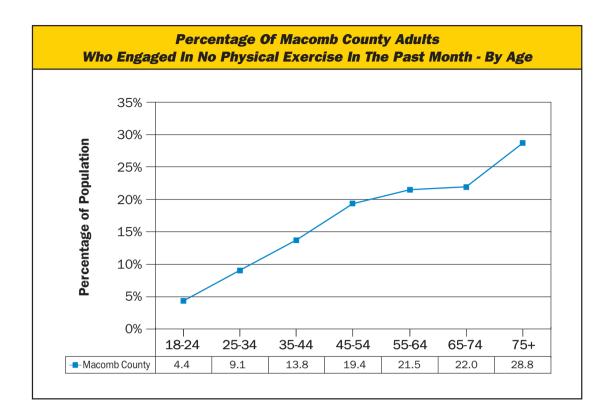
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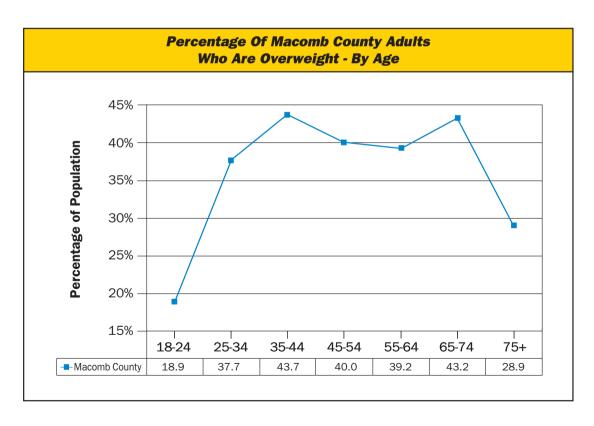




Notes: Macomb County 2002 Behavioral Risk Factor Survey - BRFS
Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know, and Refused Data.

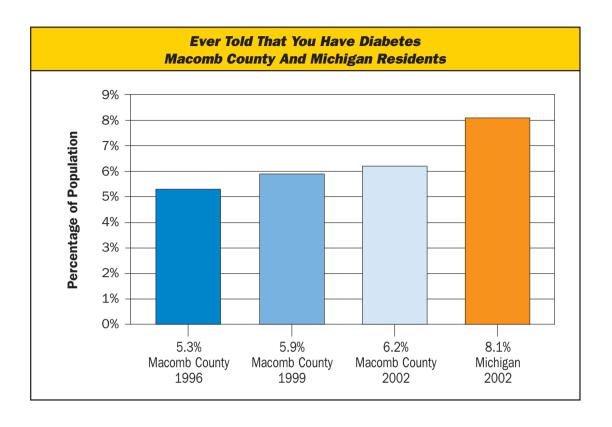
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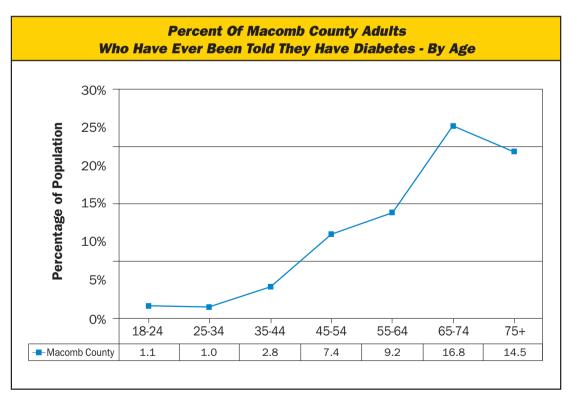




Notes: Macomb County 2002 Behavioral Risk Factor Survey - BRFS

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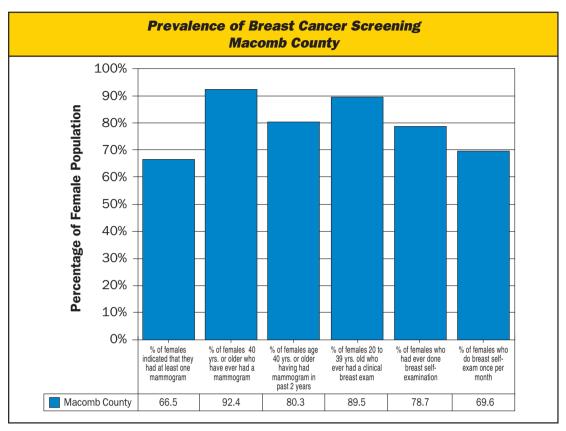


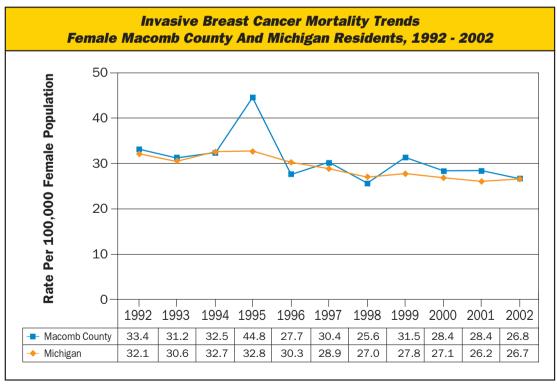
Notes: MI 2002 BRFS Summary Prevalence Report, Behavioral Surveillance Branch, Division of Adult and Community Health, National Center for Chronic Disease Prevention, Centers for Disease Control and Prevention.

Macomb County 1996, 1999, 2002 Behavioral Risk Factor Survey - BRFS

Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know and Refused Data.

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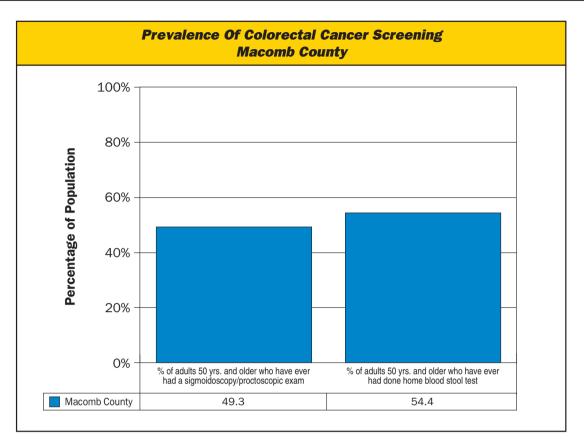
Notes: Macomb County 2002 Behavioral Risk Factor Survey - BRFS

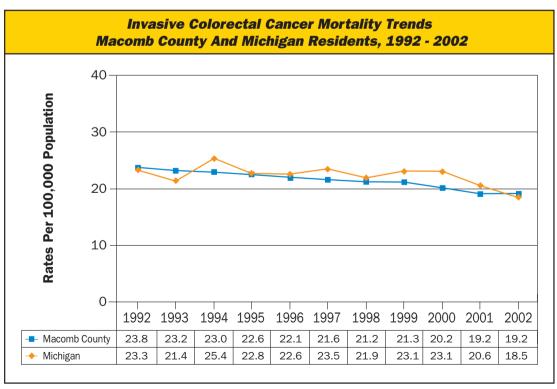
Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know and Refused Data.

Age-Adjusted Rate is 100,000 female population. Rates are computed by the direct method, using as the standard population the age distribution of the total population of the United States as enumerated in 2000.

Source of Michigan Death Data: Michigan Resident Death Files, Michigan Department of Community Health, Division for Vital Records and Health Statistics.

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Notes: Macomb County 2002 Behavioral Risk Factor Survey - BRFS

Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know and Refused Data.

Age-Specific Rate is per 100,000 population in a specified age group.

Michigan Resident Cancer Incidence File. Division for Vital Records and Health Statistics, Michigan Department of Community Health.

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Environmental Concerns - Section J

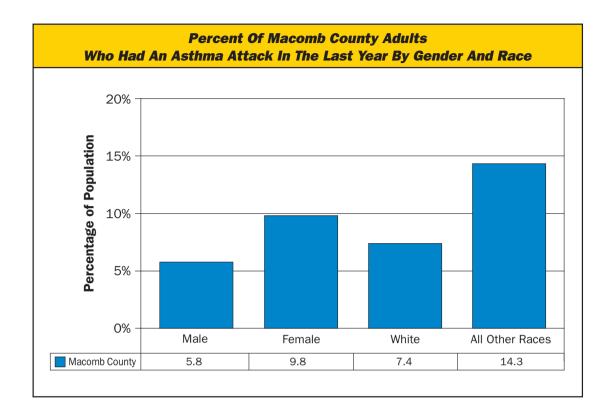
Percent of Macomb County Adults Who Had Asthma Attack Within Last Year by Gender and Race, 2002/ Percent of Macomb County Adults Who Had Asthma Attack Within Last Year by Age, 2002	J 1
Percent Distribution of Hours Exposed to Second Hand Smoke, by Gender Macomb County Adults, 2002/ Percent Distribution of Hours Per Day Exposed to Second Hand Smoke by Age, Macomb County Adults, 2002	J 2
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Radon Test Locations, Macomb County (map)	J 6
Sewer Service Area, Macomb County (map)	J 7
On-Site Septic Property Transfer Evaluations, Passing vs. Failing/ On-Site Septic Sewage Disposal Permits Issued, 1998 - 2003	J 8
Environmental Management and Risk Assessment Program (EMRAP), Macomb County, 1995 - 2003/ Household Hazardous Waste Collections, Macomb County, 1994 - 2003	J 9
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Sub-Watershed Boundaries, Macomb County (map)	J 12
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Surface Water Improvement and Monitoring (SWIM) Team Investigations, 1998 - 2003	J 14
Surface Water Improvement and Data Map, Macomb County (map)	J 15
Clinton River North Branch - West, Mean E. Coli Colonies, 1998, 2003/ Clinton River North Branch - West, High/Low E. Coli Colony Counts	J 16

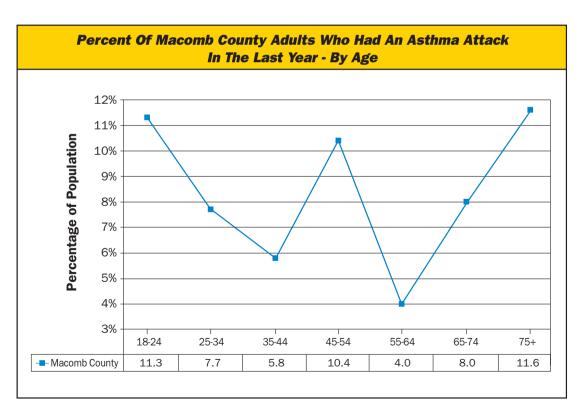
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Environmental Concerns - Section J Continued

Clinton River Middle Branch - Mean E. Coli Colonies, 1998, 2003/ Clinton River Middle Branch - High/Low E. Coli Colony Counts	J 17
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Red Run Drain, Bear Creek Watershed, Mean E. Coli Colonies, 1998, 2003/ Red Run Drain, Bear Creek Watershed, High/Low E. Coli Colony Counts	J 19
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New Baltimore Park Beach Closing and Bacterial Levels, 1993 - 2003	J 22
Memorial Park Beach Closing and Bacterial Levels, 1993 - 2003	J 23
Blossom Heath Beach Closing and Bacterial Levels, 1993 - 2003	J 24
Stony Creek Baypoint Beach Closing and Bacterial Levels, 1993 - 2003	J 25
Stony Creek Eastwood Beach Closing and Bacterial Levels. 1993 - 2003	J 26

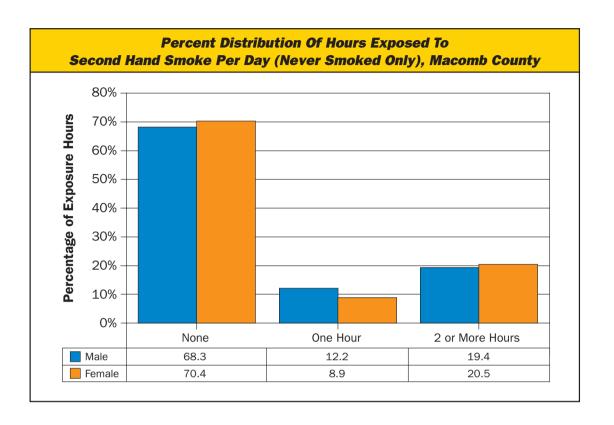
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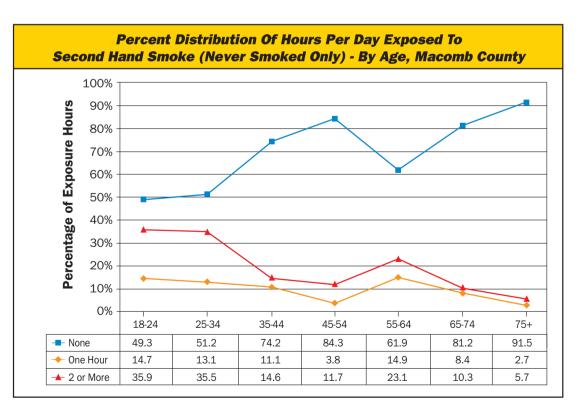




Notes: Macomb County 2002 Behavioral Risk Factor Survey - BRFS
Behavioral Risk Factor Surveillance Data - Denominator Excludes Missing, Don't Know and Refused Data.

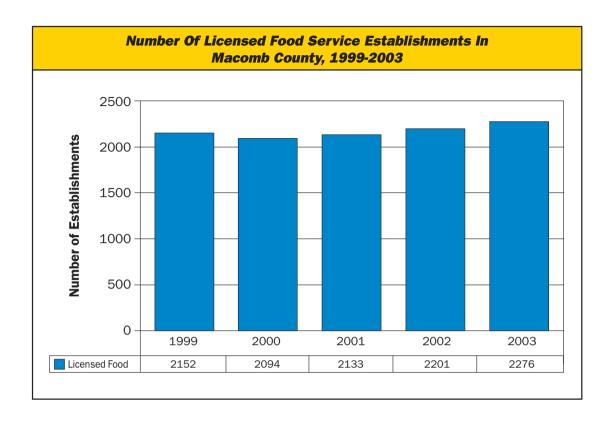
"A Public Health Profile"

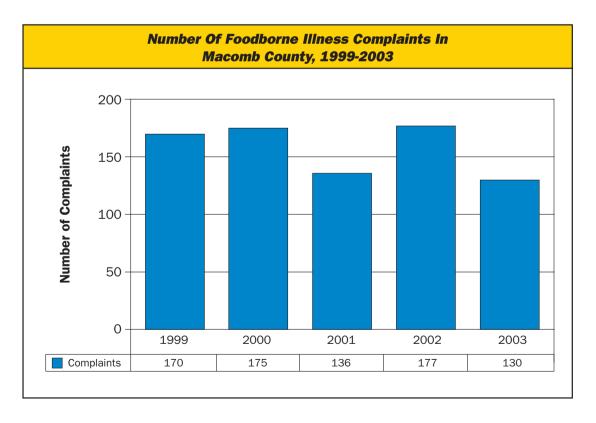




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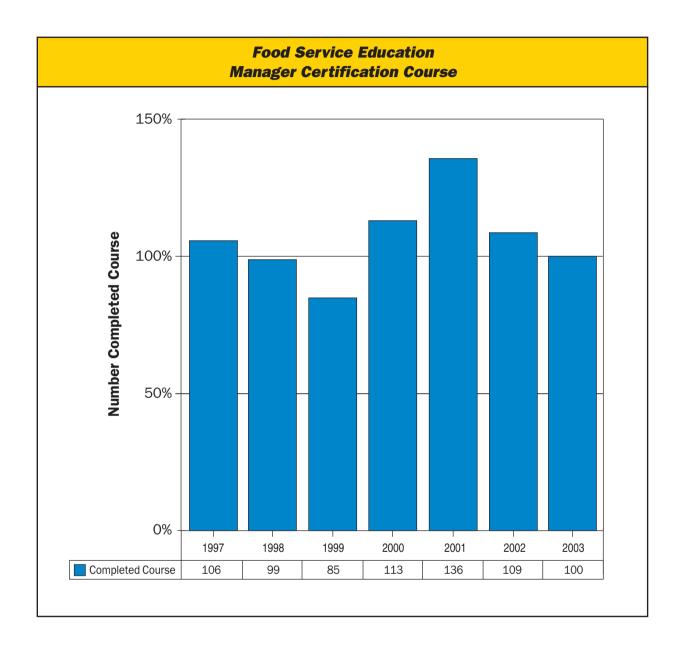
"A Public Health Profile"





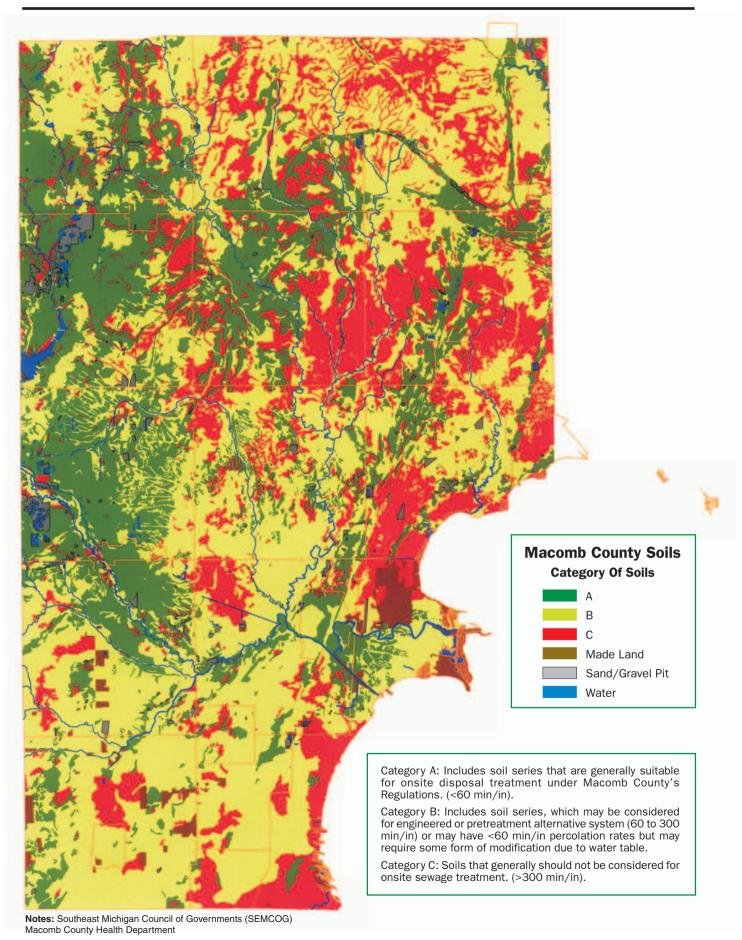
Notes: Macomb County Health Department.

"A Public Health Profile"

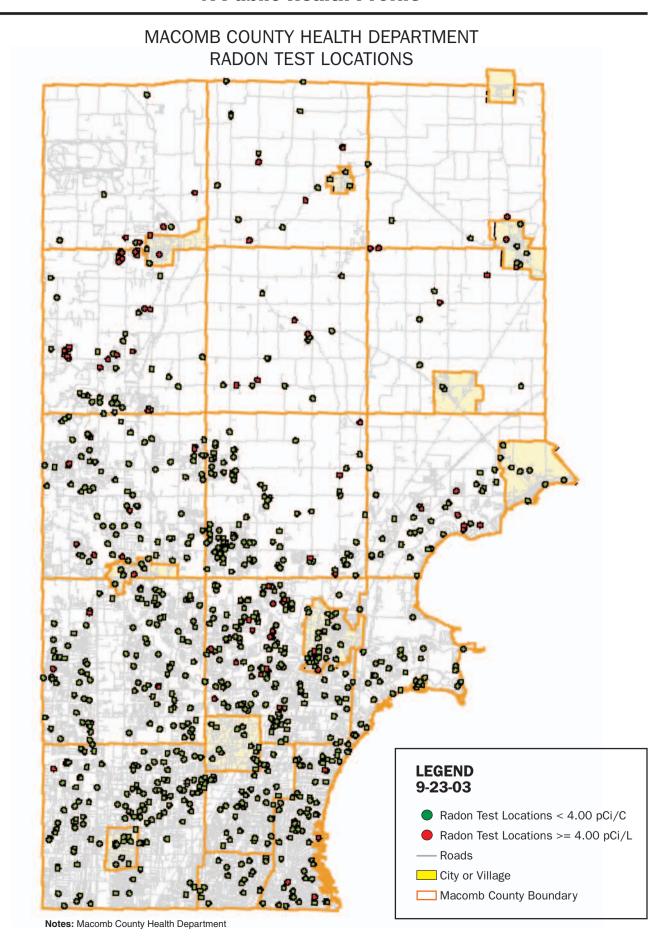


Notes: Macomb County Health Department.

"A Public Health Profile"

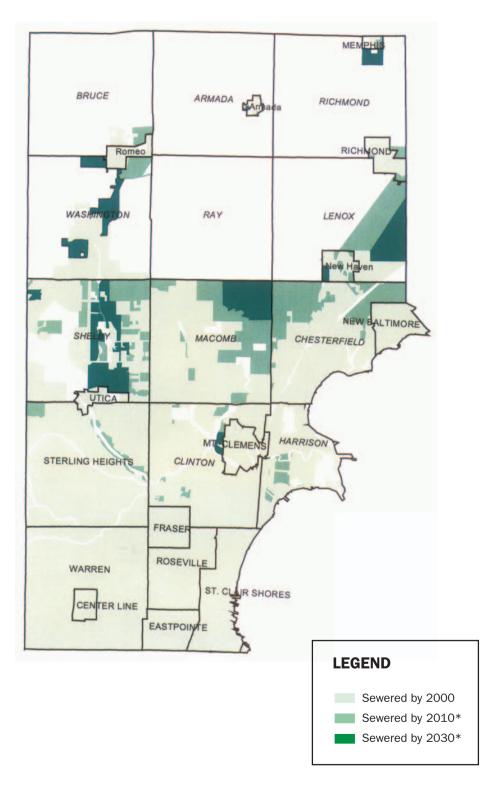


"A Public Health Profile"

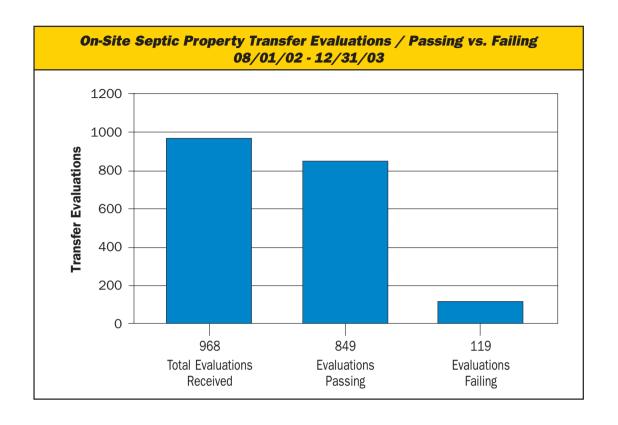


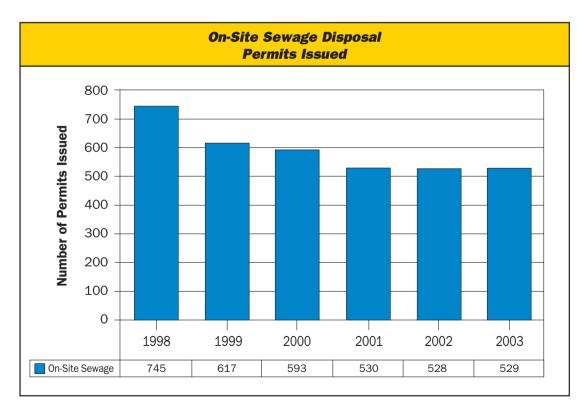
"A Public Health Profile"

CURRENT AND PROJECTED SEWER SERVICE AREA MACOMB COUNTY



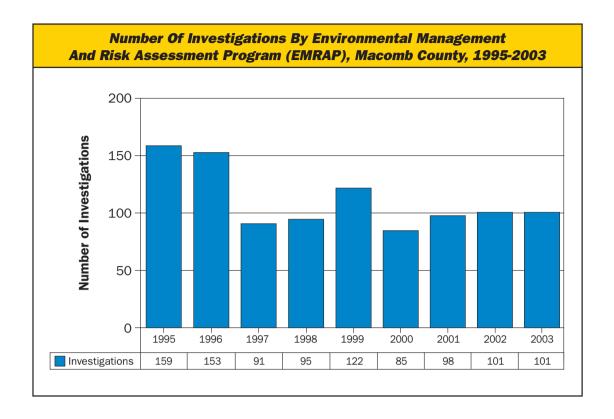
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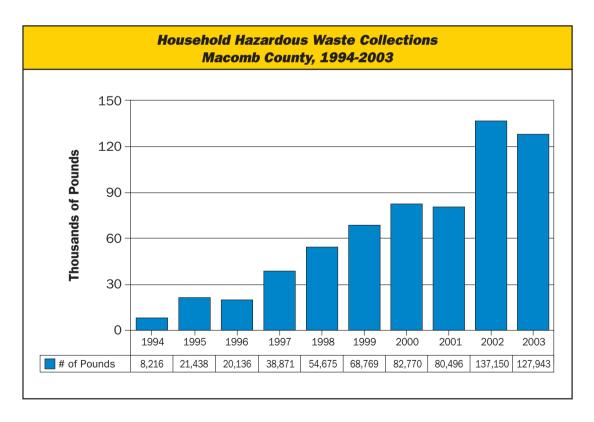




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"A Public Health Profile"

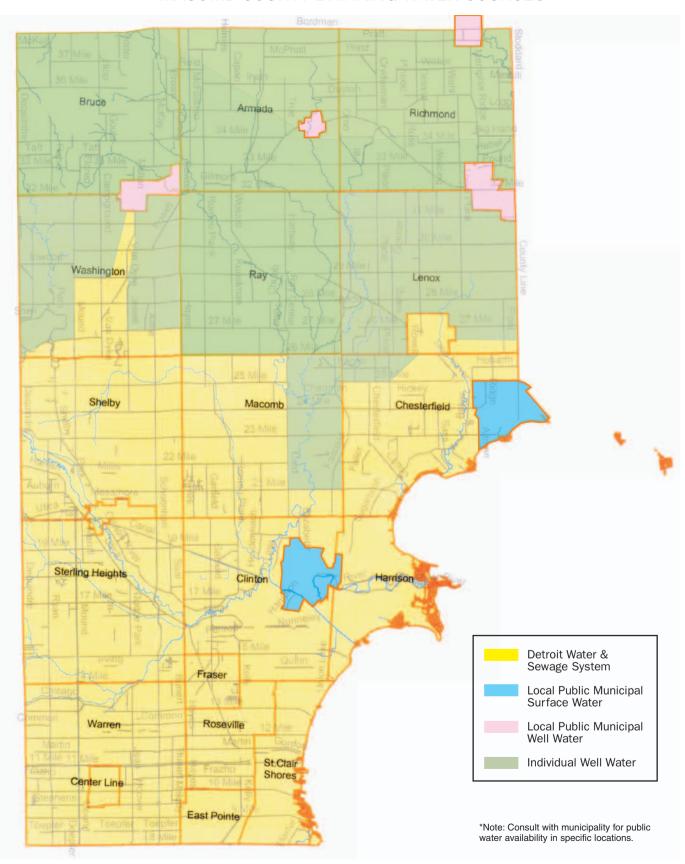




Notes: Macomb County Health Department.

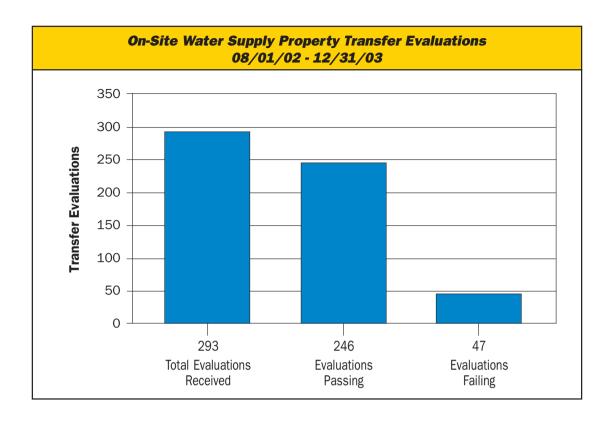
"A Public Health Profile"

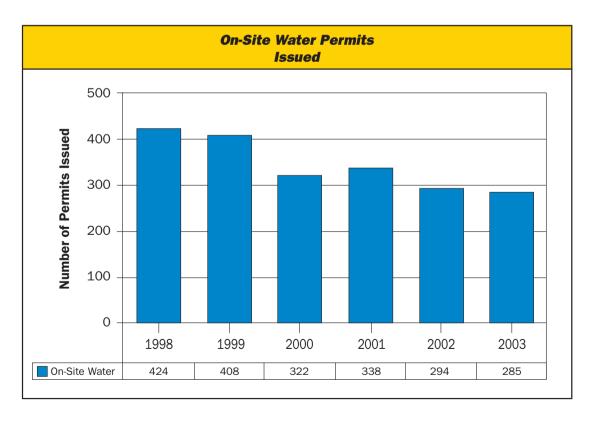
MACOMB COUNTY DRINKING WATER SOURCES



Notes: Macomb County Health Department

"A Public Health Profile"





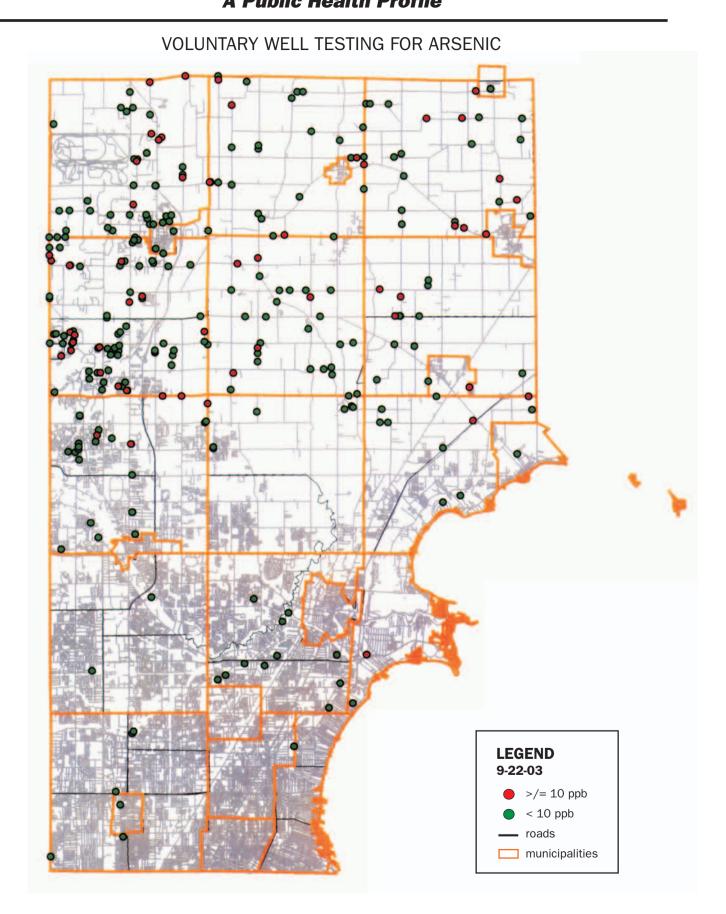
Notes: Macomb County Health Department.

"A Public Health Profile"

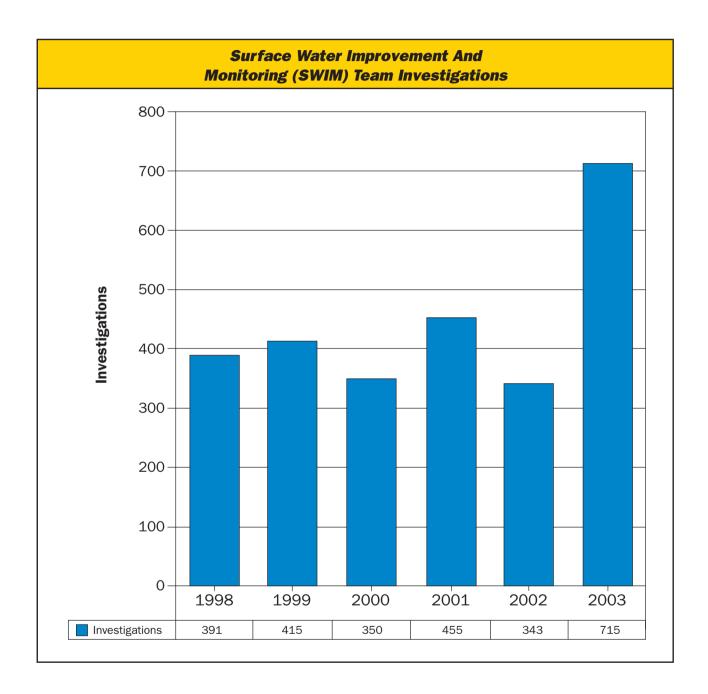


Notes: Macomb County Planning and Economic Development Macomb County Health Department

MACOMB COUNTY HEALTH DEPARTMENT CHART BOOK "A Public Health Profile"



"A Public Health Profile"



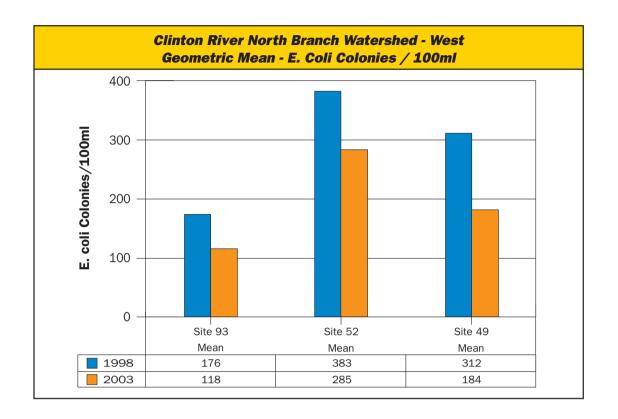
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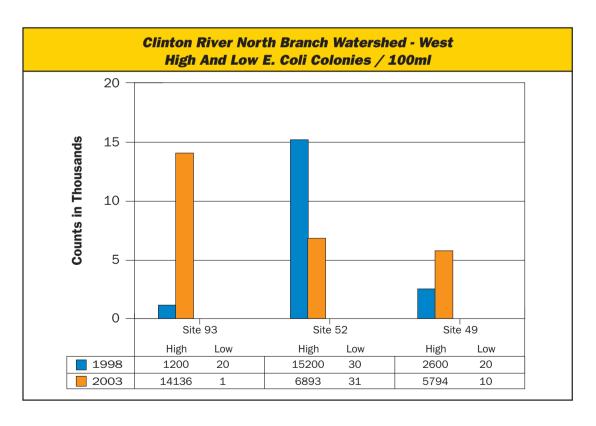
MACOMB COUNTY HEALTH DEPARTMENT CHART BOOK "A Public Health Profile"

SURFACE WATER IMPROVEMENT AND DATA MAP



"A Public Health Profile"

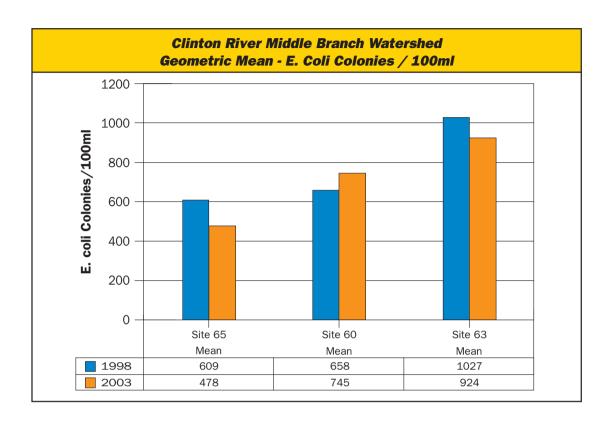


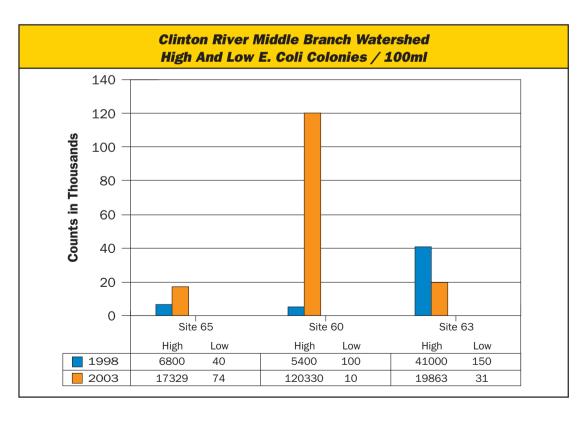


Notes: Macomb County Health Department.

Prior to 1995, fecal coliforms were used as indicator bacteria, E. coli were used 1995 and after.

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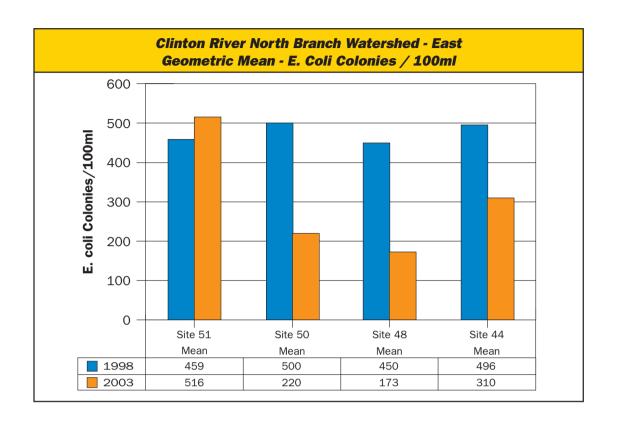


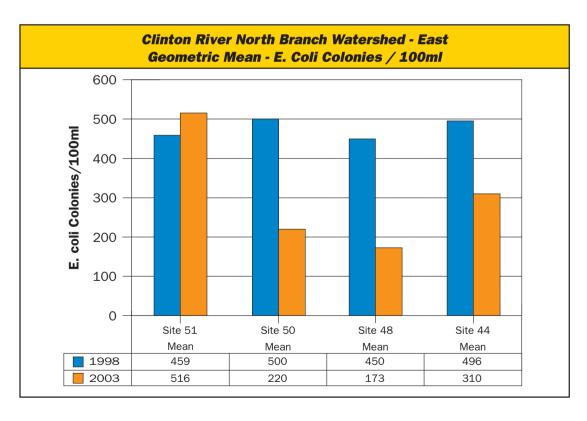


Notes: Macomb County Health Department.

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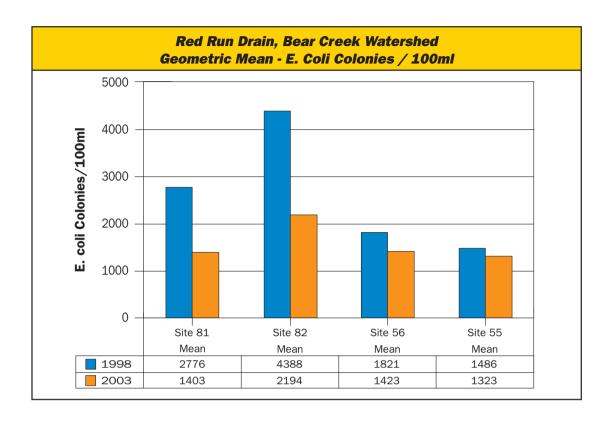


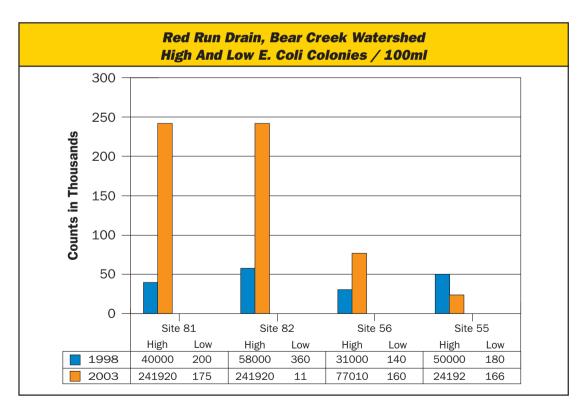


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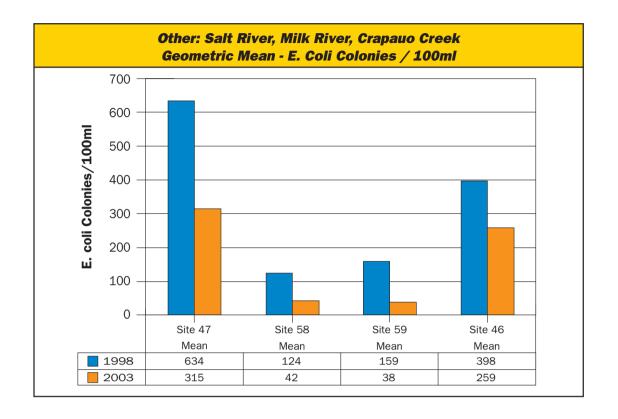


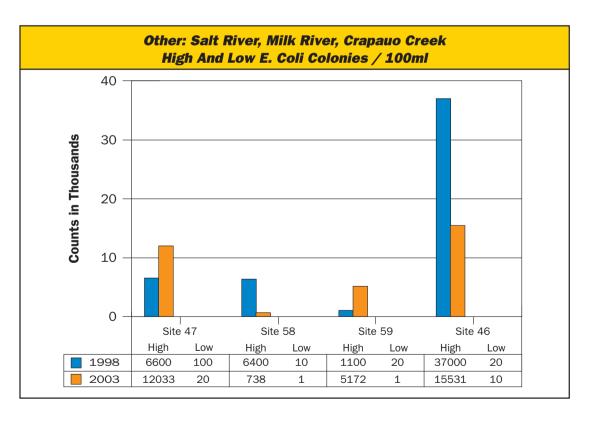


Notes: Macomb County Health Department.

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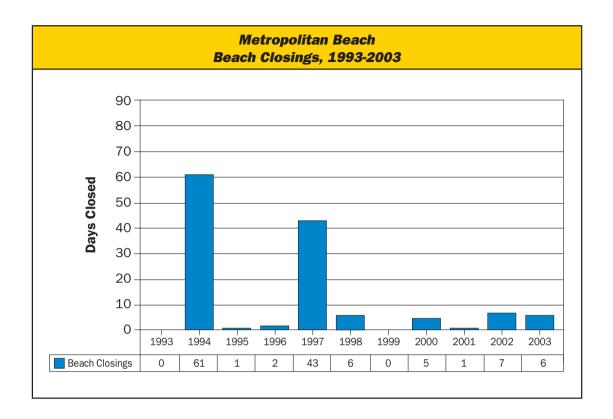


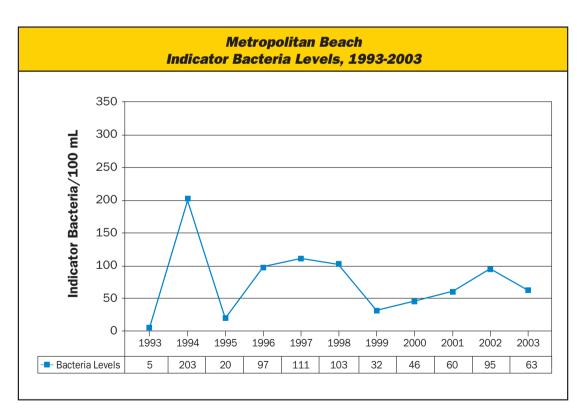


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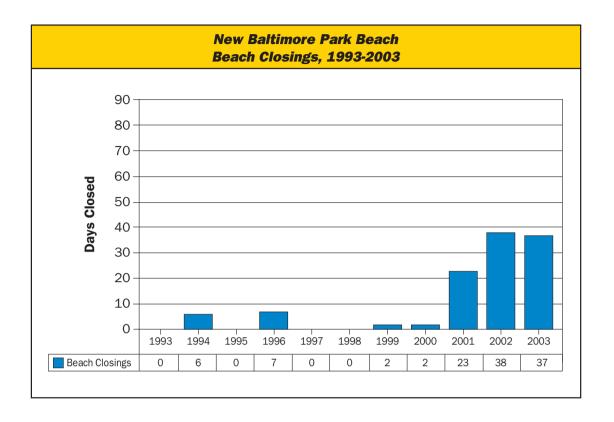


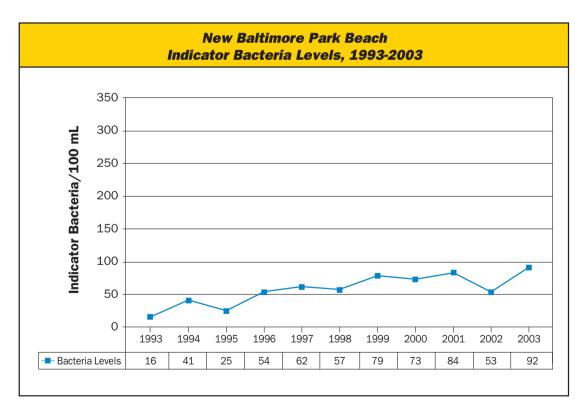


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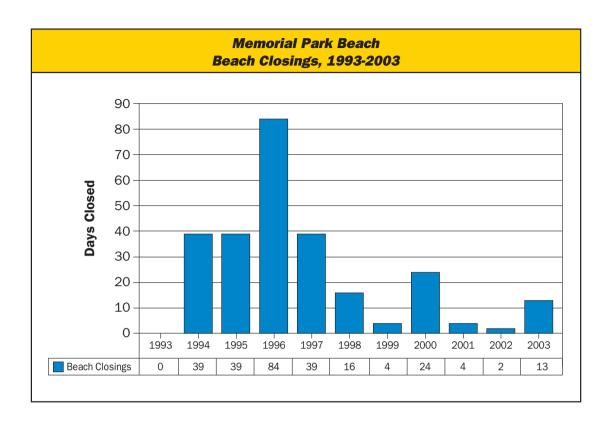


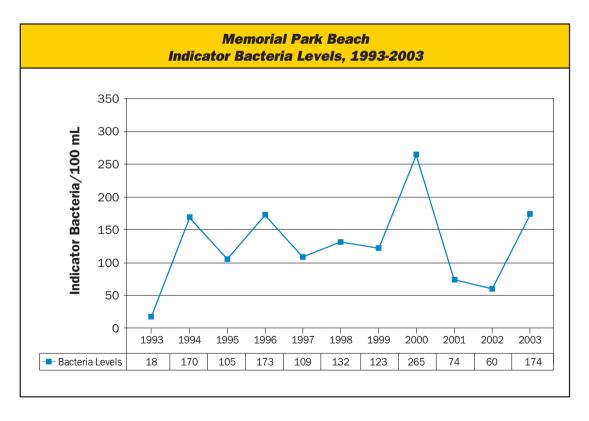


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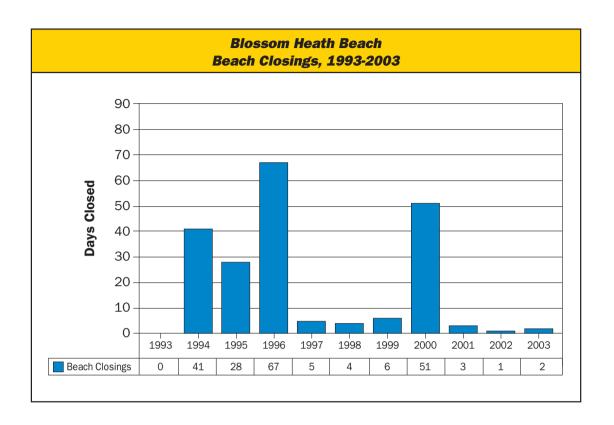


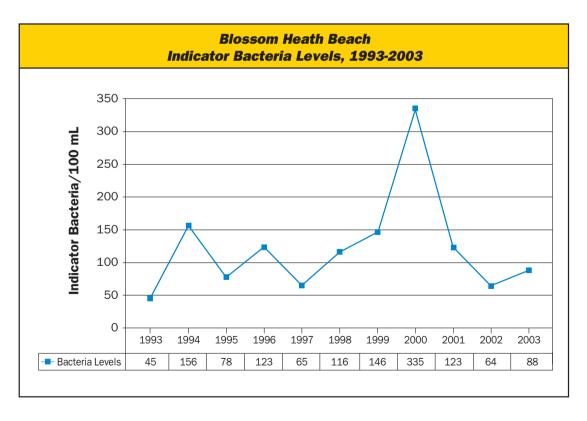


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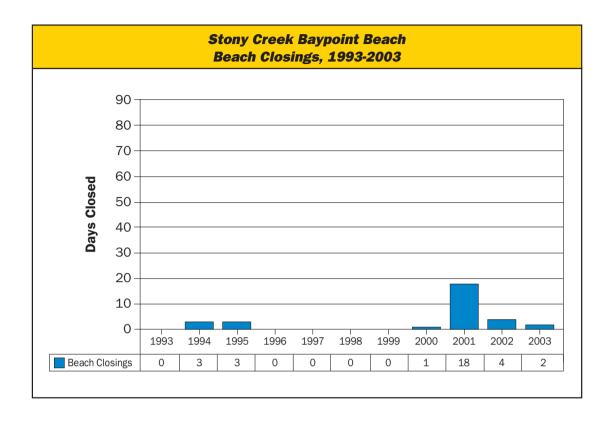


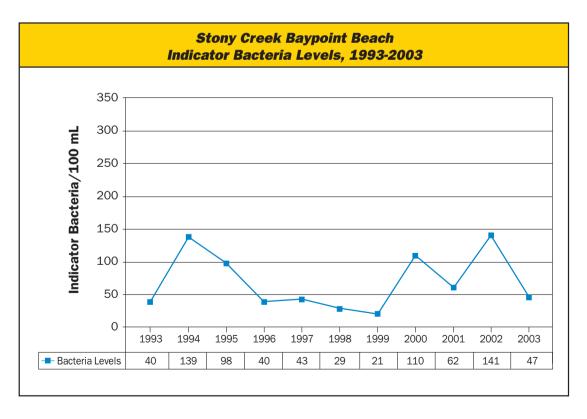


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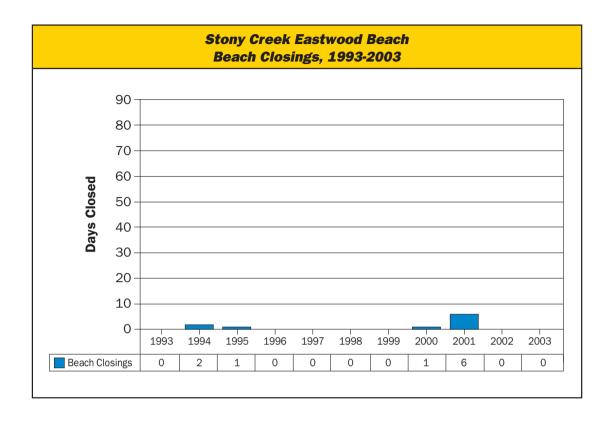


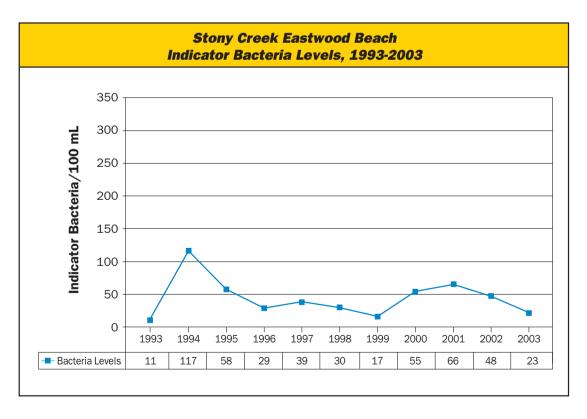


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